



HANDWORK

An Illustrated Magazine of Practice and Theory
FOR ALL WOODWORKERS, PROFESSIONAL AND AMATUER

PRICE - FREE

A New Magazine for Woodworkers who prefer
to work by hand

Vol. I - No. I
FRIDAY JUNE 29, 2017

Joshua Steven
Traditional Insulated Windows

Practical test of
Hide Glue

Brian Holcombe
The Aesthetic of formality

A Premium Plan for paying for
Labour

Letters

Thanks Salko for your effort in starting up handwork. Don't listen to the naysayers do what you set out to do and do it well. You have my support.

Anthony M. Bennett
Hattiesburg, MS

I think what your doing is a great idea. I'm a cabinetmaker and I'm using more and more hand tools in my projects thanks to you and Paul Sellers.

Barry H. Anderson
Seymour, IN

Stop your whining and get on with it, who cares what celebrities think.

Michael C. Eaton
San Diego, CA

I've been waiting for a magazine like this for years, why hasn't others thought about doing it. I'm 76years old and I've been working with hand tools for 60years and won't give em up for anyone. Good to see you youngies carrying on with the traadition.

Frank I. Bowen
Dallas, TX

I've been a subscriber to FWW for many years and will continue on with them but I will also add your magazine to my reading list. Thanks Salko

Juan F. Taylor
Corpus Christi, TX

Hello from Germany, thank you Salko for caring about the craft. You a good man who does not do this for money but you do it because you care. I'm look for to reading your magazine.

Jonas Adler
Walheim

G'day Salko,
I come from a woodworking state Tasmania and I'm a hand tool woody like yourself and like most of your readers. I've been requesting a hand tools magazine for aeons and no ones ever bothered. Finally its here and I can't wait to read it.

Ryder Skinner
WHITEFOORD TAS

It took an Aussie to bring us what we always wanted. Us Americans are just greedy for profits, thats why they never wanted to bring out a magazine for us hand tool nuts. Good on you Salko I'm sure its going to be great.

John S. Wurster
Springfield, MA

We have Paul Sellers but we now have Salko Safic who cares as much as Paul. Why aren't you charging for this magazine, I would be happy to become a paying subscriber. If your ever in England look me up.

Tia O'Donnell
LOANHEAD

Are you related to Paul Sellers? I'm glad you've decided to go ahead with this magazine. Don't be scared off by these celebrity know it alls, your doing this for your craft, you love your craft and you obviously care for all artisans. Your doing this noble act free of charge!, oh how noble indeed that is. Chin up old boy. Cheers.

Abbie Simmons
CUIDHTINIS

Please do this, don't listen to the nay sayers, just do it, we want this magazine, we need this magazine. We love woodworking with our hands not machines, My job is stressful and my craft keeps me sane. I love reading your blog more than Paul's I like Paul he is good but I like how your open and honest with everyone. Your not a pretender like most people are.

Kyllikki Nuorela
TORNIO

FROM THE EDITOR

HANDWORK is a magazine for woodworkers both for professionals and amateurs alike. As the name implies it's for those who like to work with their hands, who prefer to build using hand tools, it's a magazine where machinery has no place. I understand machinery has its place in the workforce, it saves on labour costs, work time is reduced, but machinery can never replace the human element of handwork. A router can never imitate a moulding plane, a jointer will never leave a beautifully smooth surface like a hand plane would. It's very sad to see now a day that hand planes are non-existent in most modern-day workshops.

Most apprentices in these modern times have never picked up a handsaw, hand planes, scrapers, router planes or any other hand tools other than a cheap and nasty carpenter's chisel with the thick plastic handles they over paid for in the big box store. Most large mass manufacturing factories don't even work with solid wood, they use cheap cancer inducing MDF, and chipboards, and plywoods that all imitate real wood but can never replace real wood. With responsible forestry through tree farms, we can protect our trees and our environment and have more than enough to supply the world's demands. At some point in your woodworking career you will need to learn how to master your hand tools skills if you ever want to elevate yourself within this craft. Even if you are a machinist, it is generally known that in most one off operations a hand tool will get it done faster than setting up a machine to do it.

What just constitutes handwork is a sticky subject, and one that's been debated since the implementation of machinery in the workshops. Everyone has their opinion and I will leave this topic for another day, but this magazine is about handwork. It's a window into our historical past of how our ancients used to work wood, what finishing techniques did they use, what types of finishes did they

use, what types of glues did they use and how do they compare to the modern types of glues? How did they apply veneers, what techniques were involved? It's about learning this and much more and then implementing this knowledge into your craft.

Knowing these skills and implementing these skills will elevate you as a craftsman and your workmanship to the highest standards. I will also dive into the mindset of our predecessors. There is much information that has been lost over the years I hope to bring back. Christopher Schwarz is doing just that through his books that would have been lost to us forever.

I hope to deliver many articles of various projects throughout the years ahead, by way of many contributions through contributing authors/artists. Yes, woodworking is an art and shouldn't be considered anything less.

I hope that this magazine will bring out the best in all of us and introduce to you artisans never seen nor heard from before, the ones who are tucked away in their workshops from all the corners of the world.

This magazine is about our craft, it's about you and me, it's about our unsung heroes of the yesteryears, it's all about woodworking.



*In memory of Ed Francis Young, the creator, author and
visionary of WORK*

TO OUR READERS

"Read you, and let us to our WORK"

2 King Henry VI., i. 4.

ALTHOUGH no apology may be needed for the appearance of WORK, an explanation of its Why and its Wherefore-its *raison d'être*, as our friends across the Channel would put it- is certainly desirable, and a little space in this, its first Number, may be usefully taken up in showing the causes that have led up to its introduction; the persons to whom it chiefly appeals; the objects at which it aims; the special features by which it will be marked; and the field of operation that it seeks to cover.

First, then, let it be shown why and wherefore WORK has been called, and has come, into existence. What, let us inquire, is the great demand of the time; for what are most men chiefly asking and seeking in the present day? To this question the right reply is by no means difficult to find. It is, and must be- "Better and fuller means of Technical and Practical Education."

Never, indeed, it may be said, was the demand for technical education greater than it is at the present time! Never was it heard more that it is now among workmen of British nationality! And why? Simply and solely because of late years it has become painfully apparent that by means of increased facilities for obtaining technical knowledge the foreign workmen have been stealing a march upon them.

Never, forsooth, at any time has the necessity for sound technical education for the workman been so thoroughly impressed upon the minds of men as now; and never has it been so eagerly desired and demanded by all grades and classes of the people.

At the present moment, there lies in the pigeon-holes of the British Government a Bill for the Promotion, Extension, and Elaboration of Technical Education in the United Kingdom, which will be discussed and moulded into law at the earliest opportunity. Our Universities and great Public Schools are awakening

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Positions Vacant

None - Blame me

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to the necessity of teaching the hands to work as well as the brain to think. In every large town, and in London itself – the head as well as heart of the Empire – a craving is springing up for the establishment of technical institutes and workshops, in which any and every man, whatever may be his social station in life, may obtain improved knowledge of the leading handicrafts that are practised by men, or even to learn their very rudiments, if he so requires.

In these amateur workmen are already assembling, that they may better know through practice under trained teachers how to carry out the work they may have adopted as a hobby; and professional workmen that they may become better conversant with the theory that underlies the work they do; and by this, and a quickening of their taste and perception of the beautiful in form and perfection in execution, gain greatly in skill, and capacity for carrying out the work by which they have to live.

And all grades of workmen are alike led to seek self-improvement, because they have realised the truth of the grand old saying – Knowledge is Power.

To meet, then, at a most critical period of our national existence, the needs of workmen belonging to each and both of the two great classes into which workmen are naturally divided – professionals on the one hand, and amateurs on the other – WORK has been brought into being. That WORK will prove the most useful and most complete serial of its class that has yet been given to the world, there is every reason to believe; and, without doubt, it will be eagerly sought after, read, and followed by those for whose benefit it has been produced, as the first, the best, the most helpful, and the most reliable practical instructor of the times in which we live. Nay, more than this, it may be regarded as being verily unique in itself through the comprehensiveness of its scope, for although efforts may have been made, prior to this, to help and instruct the amateur, never yet has any attempt been made to regard all workmen, whether workers for gain and daily bread or workers for amusement and recreation, as one great

family possessed of common aims and actuated by common interests, who enter the lists of competition in friendly rivalry alone, to provoke one another to the execution of work of greater excellence than either the one or the other has yet produced. Each class has much to learn of the other; each class can teach the other much. Time, it is to be up and doing, and, with regard to those who write in the pages of WORK, it is to lead and help their fellow-men to better things that they are banded together. They, verily, are first afieled to guide where assistance and lend a helping hand wherever aid may be sought. And this they will ever do in the spirit of Solomon's mingled counsel and command – "Whatsoever thy hand findeth to do, do it with thy might." Mention has been made, well-nigh in the same breath, of the amateur and the professional workman; but are they not more closely akin than superficial thinkers are disposed to allow? Are not all men amateurs alike? Are not all professionals? Verily, yes; each and every man in his own order. What, indeed, is the difference between workmen, amateur and professional, save that the latter practices his craft or calling for gain, and the former loves and cultivates an art for his amusement. The distinction is very much like that which has been drawn from time immemorial between those who live to eat and those who eat to love; and the comparison runs far more closely in parallel lines than may appear at first sight, for if the professional works to live, does not the amateur in an equal degree live to work? Even a professional workman is an amateur in everything else except the one particular handicraft by which he lives; so that, speaking fractionally, every man, if he be one-fourth professional, is very likely three-fourths amateur and so may be regarded as being in point of fact more of an amateur after all than he is of the professional.

Said a working man to a writer one day, "I look upon myself as an amateur in every man's trade except my own, and as I like to know something about all trades besides my own, I hail with pleasure every source from which I can derive some knowledge of them."

Every man, indeed, has, or ought to have his hobby whether he be professional or not, and therefore, in seeking to administer to the improvement of one class and to build up and augment the knowledge of its members, precisely the same thing is done in the interests of the other.

This has been said to show that the pages of WORK are intended for both groups of workmen alike, and to point out, on the good old principle that what is sauce for the goose is sauce for the gander, that that which is desirable and useful and desirable for the other. If there be any difference at all, it will be found to consist chiefly in this – that the professional workmen require and desires to gain in comprehension of theory, and the amateur conversely, in practice, and thus each will be brought on *pari passu* to the same goal – perfection in execution.

We must now pass on to consider briefly the objects of WORK, and the subjects that are to receive treatments in its pages. On this it is only necessary to say that in the papers which will appear from week to week will be found a clear and practical exposition of the *modus operandi* to be followed in every art, craft, or science that bears directly or indirectly, on handiwork of a constructive or decorative character, the directions being supplied and comments made, either in short single papers, or in series of articles tersely and comprehensively written.

If the reader presses for a more accurate definition of the nature of the articles that will be treated in WORK, let him attempt to sum up in his mind for a moment the handicraft trades that are most familiar to himself, and endeavour to realise that instruction will be given on, or notice taken of, every one of them sooner or later. To catalogue them would be simply to make a list of every kind of constructive and decorative work that is practised by man. Let us take this as done, and so avoid the waste of time, space, and power that would be involved in its preparation. Number 1 and Part 1 will sufficiently serve as samples of the

whole. It is impossible, manifestly, to touch on everything at once, but everything nevertheless, will be touched on in time.

In general character, WORK will be purely technical and instructive. Nothing that comes within the region of polemics will be touched on in its pages, and discussion will be permitted on such subjects only as are processed of common interest for all readers.

With reference to the special features by which WORK will be marked, it may be said that every paper that requires it will be fully illustrated with sketches, diagrams, or working drawings to scale as may be described. This alone will tend to render WORK invaluable both to the workman himself and those at whose bidding and for whose benefit he may work.

New machinery, new tools, new appliances, new arts, new processes, new modes of treatments will always find exposition in its pages, and a special feature will be made of OUR GUIDE TO GOOD THINGS, In which notice will be taken of tools, machinery, technical works, etc., and all things useful and novel that manufacturers and inventors may produce in the interest of those who labour with the hands. Manufacturers and others are requested to send the Editor timely notice of any new tool, machine, or appliance that they are about to introduce as a new claimant for public favour.



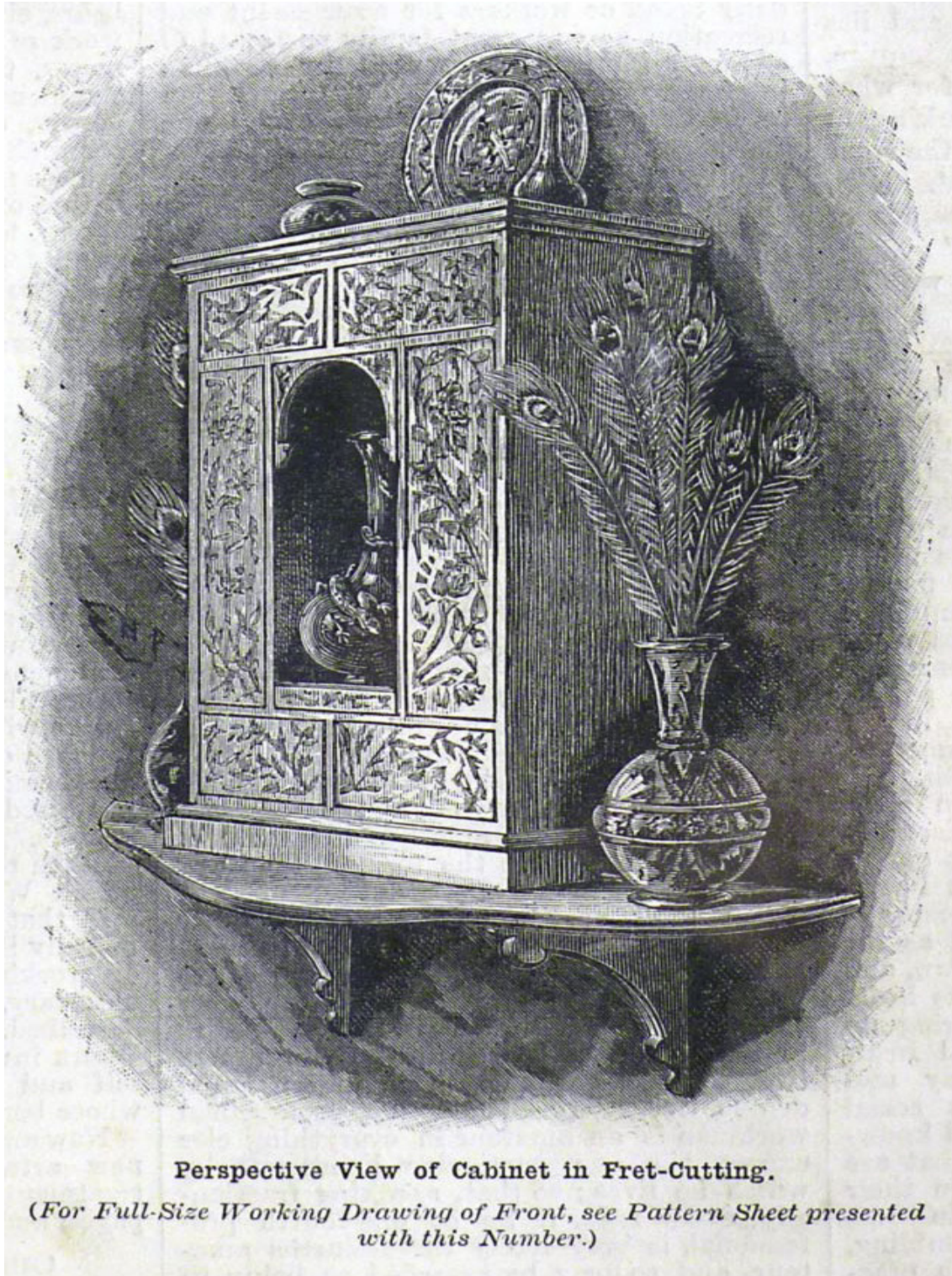
SAFETY TIP

Safety is the ultimate responsibility of every woodworker; hand tools are safe as long as they are used as per manufacturer's instructions. Keep all blades sharp, blunt tools are dangerous and will result in poor work. Mind where you place your hands when using your tools. Never work wood when you're tired or intoxicated, even the smallest amounts of alcohol can result in poor vision and judgement. When operating machinery, read and follow the recommendations of your machines owner's manual, using appropriate guards and safety devices, and maintaining all your tools properly. Use adequate sight and hearing protection.

A CABINET IN FRET-CUTTING

An Art-Work for Skillful Workers

BY J. W. GLEESON WHITE



Perspective View of Cabinet in Fret-Cutting.

(For Full-Size Working Drawing of Front, see Pattern Sheet presented with this Number.)

There are, it's sad to remember, some amateurs in fret-cutting whose method (or lack of it) is to trace their pattern with 1/16" of its outline or thereabouts, and then paste the design upon a rough piece of wood from a cigar box, cut it vaguely within another 1/16" of the tracing (this only give 1/8" away from the line, really a very fair result, as they take it sometimes in excess, sometimes less, so it comes all right in the end), then, having pulled off the tracing with the help of a moist finger and a blunt pocket knife, proceed to make it up, with one white tin tack, one blue one, and a good big crack across the fretwork itself, and stand enraptured at the result - a bracket, say, that only cost one shilling for pattern, saws, and wood, and is worth less than the least valuable thing in the universe.

Too such as these I speak not, nor even to the patient school boy, who spends untold energy and turns out most creditable fretwork, yet contents himself with such rudimentary joinery that, however excellent the actual sawing of his design, when his work is done, it is merely "fretwork."

This design must be finished by a good joiner, whether by the amateur himself or passed over to some Professional matters not, so long as it is well done, for this cabinet is distinctly not worth doing badly- few things for the matter of that; and unless the would-be maker is willing to devote skill and care beyond the usual run, he had better, select another of the many patterns available, and, saying, "That thing! why, it is not worth cutting; look at all the small holes the idiot has put in it!" or some such graceful word, bid it depart from his sight, for he will have done of it.

Yet, though the work involved is not to be rapidly done, the gossip about it may be short. It is intended that the fretwork be worked in duplicate in very thin ebony, or in wood stained black after cutting, and mounted afterwards on holly or other white wood; both being polished before being glued together, of course. The fretwork may be cut two pieces at a time; this reduces the sawing by half, and yields facsim-

ile replicas of the patten. The rest of the framework to be of ebonised wood polished, with appropriate mouldings of fine, neat design. If the four smaller panels can be worked to drawer fronts it will be much better; but, in lieu of that, cupboards will suffice.

For inlays-and by that, I mean the usual plan of replacing the cut pieces of wood in the holes from which they came-an alternative half of the design is shown much modified in its details. For since in this case the necessary perforations drilled in each cut-out piece to admit the saw can hardly be arrange so deftly-always at the point of an angle- that when each piece is replaced there are no blemish to the work, it will be better to reverse this arrangement of the wood. That is, to work as usual the whole design in white wood, staining the cut-out pieces with Stephens' ebony stain. These should be carefully replaced, and the holes stopped with a mixture of sawdust and glue before polishing, the whole sur-face being glued to a thin backing of hardwood.

If the one who suggests it may so, I do not think this plan would be so effective, although more genuine in some respects. As a practical hint, I would suggest lining the wood with newspaper and replacing the pieces from the back, when the puzzle-for such it is will be greatly simplified by the clue afforded in the printed matter. For the first method, knowing how easily white wood darkens with age, whether polished or plain, it may be that a coat of fine white enamel paint would be better for the under part.

It is possible that if the cut and polished wood were lain over the varnished paint when wet, and left under a heavy pressure, that the junction would be as firm as glue. It would certainly avoid the danger of the glue oozing beyond its place and staining the visible parts of the design.

The framework of the cabinet being pure joinery, I need not speak of it here; more skilful cooks attend to the joints in our menu; my business is to provide the entrees and sweets only, and, as too many of the former is a pro-

verbal danger, it is safest to leave the others to explain the serious parts of the programme, as they are so well able to do.

It may be best to repeat the advice of absolutely perfect finish, so far as in this imperfect life such a thing is obtainable. For very many ornamental objects, whether carved or painted a certain roughness and irregularity of handling gives a real artistic value, lost in merely "niggling" precision and absolute accuracy of detail. But for a cabinet on so small a scale, and in the style of symmetrical design chosen, an almost mechanical rigidity of correctness and unstinted labour attain the very best result practicable must be extracted then the amateur may put his work beside that of the skilled artisan with no fear of the contrast, since, in an art so mechanical as fretwork, the individual temperament of the artist that tells so largely in wood carving is practically unfelt.

In the illustration given in this page is shown a perspective view of the cabinet when completed and placed on a moulded shelf specially prepared for its reception.



The Tanning of Wood

In order to improve the color of certain native woods of Germany for use in the better grades of furniture a special treatment has been tried with success. The freshly cut wood of birch, oak, elm, pine or spruce is buried in earth mixed with lime and other materials and left for three to five months, which is said to impart to the wood a remarkably fine color, so that it can be used without staining or painting. The color changes throughout and is supposed to be due to a change of the tannin. It is also claimed that this tanning process reduces very materially the tendency of wood to "work" (i. e., shrink and swell) so that dense hardwoods may after treatment be used without fear from that source.

S. J. RECORD.

The Lighting of Workshops

The question of light in a workshop of any kind is of the first importance. Top-lighting usually provides the best general light, whether it be natural or artificial, the diffusion usually being so much better than side-lighting, which shows on one side only, although if two sides can be made available for the admission of light, so much the better. In any case, the windows for the admission of natural light should be large, while the window and sash framing should be as small as possible.

If possible, with natural top-lighting, the light should come from the north or northwest; but in any case the windows should be so arranged that the direct sunrays do not fall directly on the articles being worked on. This can be done by arranging the roofs on the ridge and furrow principle, with glass on the north side, and then, by carefully whitening the inside of the slated roof, very little light will be lost.

There is little need of special preparation of whitening mediums; but if ordinary ball whiting is reduced, with skimmed or separated milk, to the consistence required, and a little carbolic acid added to prevent decay, the wash will not come off, this making an annual renewal each September sufficient for all practical purposes.

Where ordinary skylights are used, a thin blind should be provided to obstruct the direct sunlight, this being on a roller conveniently placed, the blind only being used during sunshine. If treated with a weak solution of sulphate of copper, such blinds last much longer, and, as this costs little, it may well be considered.

In arranging for side lighting as large windows as possible should be used, and these should come as low as possible, as during at least part of the year natural light is feeble. Roller blinds of scrim should be used to obstruct direct sunlight when it becomes too powerful, and where it is desired to prevent the workpeople from too much window-gazing, rolled or other wise ob-

scured glass can be used without much reducing light only the lower panes, of course, being of this material.

Paint and other substances which obstruct the passage of light should not be used for workshop window obscuration, and for temporary exclusion of very bright sunlight, blinds should always be used.

For general artificial lighting, the whole of the roof (or ceiling) and the walls should be kept whitewashed, and fairly powerful lights so arranged that the light is thrown upward and outward should be used, this causing a diffused light to be spread over everything, its intensity varying with the power of the lights used.

Such lights should be well up in the place to be lighted, in all cases being three or four feet above the heads of the persons working under them. Low power lights should also be put in for lathes and other tools, and these should be of an adjustable character. In some cases suspended lights which will slide or in some other way move vertically will be preferable, while in others simple swinging brackets with two or three joints will give the greatest service, in each case the object being to provide the most convenient form of lighting for any particular machine or process.

For convenience, electric lights are about best; but very many workmen prefer gas, as this, they say, does not tire the eyes so much—a point possibly they are quite competent to judge so far as they are personally concerned.

For many temporary purposes portable appliances can be used, oil being used in conjunction with compressed air; but for numerous purposes lamps of some kind are quite a necessity, as other appliances candles, perhaps, excepted could not be used, owing to local conditions.

Close quarters in which to work will largely govern the form of lamp used, and then, again, the vibrations caused by the use of hammers and percussive tools will render many otherwise

desirable lamps impossible to use. For these reasons, more than one form of lamp becomes necessary where general work is done, and these lamps should be kept in the stores ready for use. and when done with should be at once returned, so that they may again be got ready against the next time they are wanted.

The material on which work is done has a rather strong bearing on the methods of lighting adopted, because while one particular material, by reason of its absorbing light, will require special brilliancy of lighting, another, for the opposite reason, will require a more subdued form.

If you are working on, say, black velvet, a very strong light will be necessary; but, on the other hand, if you are working on polished metal, that light would cause such a glare and glitter that the eyes would be dazzled, and work could only be carried on in a very uncertain manner. No fixed rule can be made as to the amount of light needed per person employed in any particular trade if calculations are based on the candlepower required; but sufficient light for each particular individual must be provided, or both work and workman will suffer, and produce a reduction in the work done.

Personally, the writer does not believe that working by artificial light produces the results which occur where only day light is used; but, at the same time, in most places artificial light has to be used to some extent. This is unavoidable during part of the year, naturally; but in very few cases is it necessary to work overtime, if the work is properly arranged.

Walter I. May in the English Mechanic.



Building a Sawyers Bench

BY SALKO SAFIC



If you're going to hand tool woodworking then you need a good solid sawyers bench. I used to use a saw horses for all my ripping and crosscutting, but I wanted something better, more stable. There just had to be a better saw bench and so I devoured the net for ideas.

I looked at Chris Schwarz saw bench, then Shannon Rodgers bench and finally at Tom Fidgen's saw bench. Well that definitely was a winner for me, the bench stood just over 20 " and just over 12" wide with a split top 35" long. I like the idea of a split top, it meant that I can safely rip not so wide material. It has dog holes for clamping (holdfasts will not work if your bench is under 2" thick), and a fence for crosscutting. I made holes on both sides so the fence can be used on either side. What I also like about this design is that one side of the legs are splayed and the other is square. What this means is that you can use the square side as a reference while ripping while the splayed side provides great support to stop the bench from tipping.

You can find the plans in his book "Hand Crafted Projects for the Home and Workshop." In it are the plans and easy to follow detailed description on how to build it. I won't give any dimensions except

for the process I took to building this remarkable sawyer's bench.

The materials I used were Radiata Pine for the legs and stretchers, Red Cedar for the Fence and Aprons, and Hoop Pine for the bench top.

I started off by planing the legs square and true, then scribed a deep knife mark to cut a notch into the stretchers. I sawed along the line, chopped out the bulk with a chisel and levelled the bottom flat with a router plane.



Cut series of saw kerfs, chop out the waste and finish off leveling the bottom with a router plane.

On the legs, I cut a ship lap, because the legs are slightly splayed and you can see by how much in Tom's book, I made it easy on myself by angling the leg in the vice slightly. This way I can saw vertically while making an off angle cut. I also used a bevel gauge to mark the correct angle, I did the same for the bottom of the legs. Once cut, I planed the bottom of the legs flat and pared the ship lap to the knife lines.

Once the legs and stretchers were complete, I did a dry test fit, once satisfied everything fits correctly I then proceeded to the bench top.

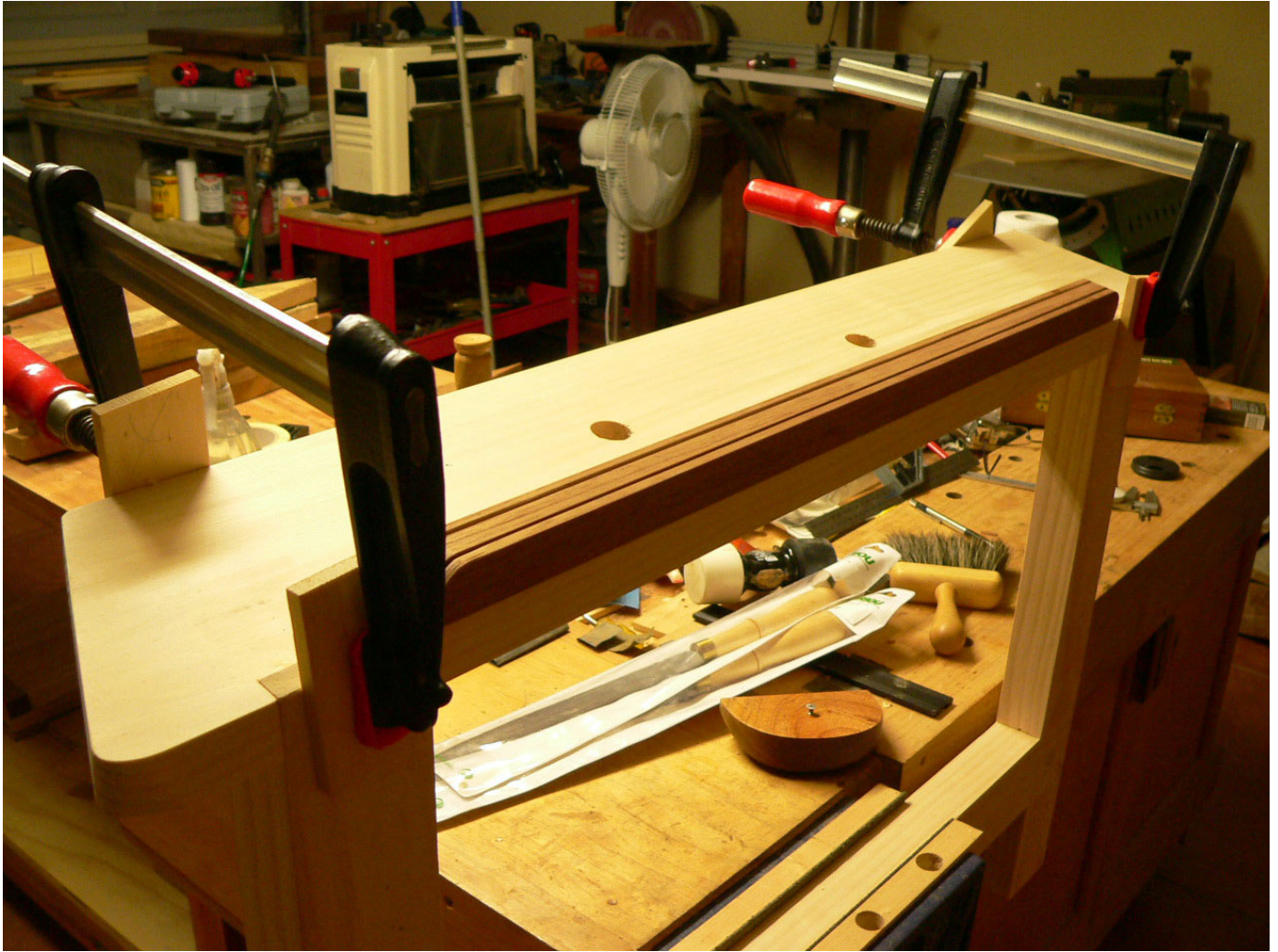


Dry fit assembly

I ripped and crosscut it to length, then rounded the corners using my marking gauge base plate as a template. I cut four notches on the edges to accept the legs, bored a series of holes on the top for the hold fasts. Because the top's thickness is just under an inch, it's not thick enough to act as a wedging action for the hold fast. So, I would skip this part of the build. I also drilled some holes for the doweled removable fence. This fence is indispensable for crosscutting, a great idea and can be removed for ripping.



I used a 9g Cabinet Maker's Rasp and a 13g for a smoother finish.



I first glued and clamped one half of the bench separately, after allowing the glue to cure 24hrs, the following day I bored two holes in each leg for some shop made dowels. Applied some glue on the dowels and in each hole and hammered them in. I also left those to dry overnight before leveling them flush with a block plane.

I now turned my attention to the aprons, I planed, ripped, crosscut and shot them to the final dimensions. Drilled some holes for the screws, glued with some hide glue and screwed them in place.



The fence was pretty easy, I used a marking gauge to draw a profile on the ends, you don't have to do this but its a nice decorative touch. Then shaped the profile using a chisel and finished it off with the rasps. For added decorative features I went ahead and added some beads, I simply used a handy shop made tool, if you have a beading plane you can use that too but this shop made tool I feel does a better job as the appearance seems to be more pleasing to the eye. All it is, a block of wood shaped to fit my hand comfortably with a phillips screw in it. I would file the head so the edges would be sharp to sever the fibres in the wood. I would run it down the wood several times with each pass scoring a deeper scribe, while at the same time slightly rounding over the inner edge. I would then reach for my tenon rip saw and deepen that cut and finally finish off the bead with a block plane and some sandpaper.



Use a marking gauge to draw the profile

Then pare away with a chisel

Finally finish off with a 9grain and 13 grain rasps and some sandpaper if you were heavy handed with the rasp.



I drilled some holes on the bottom of the fence for some dowels. These dowels are glued to the fence but not in the bench, as the fence needs to be removed when ripping wide stock.



The sawyers bench is now complete. I applied some orange shellac and then did something I shouldn't of. I applied wax! Never apply wax to the top, what was I thinking; I honestly wasn't.

The Art and Practice of Veneering

BY C. R. MASON



WITH the veneering business, as in the printing trade some of the finest and most elaborate, interesting, and valuable work is done by hand. We may stand with admiration and a certain degree of awe watching an enormous Hoe press printing newspapers, folding and delivering them as fast as one can wink, and we marvel at the wonderful intricacy of the mechanism involved in the work, but just the same some of the finest work of the printer's art, that which we store away carefully and admire for its artistic appearance, is done tediously and slowly by hand.

It is pretty much the same way in the veneer business. A man running a little one-horse shop may feel envious of the big establishment with all the modern up to date machinery, with glue machines having automatic feeders or regulators, and everything operated on scientific principles. All of this may make the one-horse man feel like he doesn't account for anything in the veneer business and he never will amount to anything for he is so far behind in the race. Yet the fact remains that the finest veneering is done by hand, and often the most interesting work is to be found where people are doing a small quantity of work carefully by hand.

Where Some of the Finest Work is Done

Therefore, instead of the men doing small work, just doing a little incidental veneering by hand, being discouraged and feeling that they are not in the veneer business they should take pride in the fact

that they are in position to do experimenting and do elaborating that is not practical in connection with the quantity work done in the larger institution. Whenever you see a piece of furniture in a show window with very elaborate figures, very carefully matched so as to bring out striking effects, you can just bet that a great part of this work at least was done by hand. It required careful

preparation and individual fitting of the pieces to secure the matching of figures and it is this way all the time.

It has been since the very earliest days of fine cabinet work. Way back in the days of Roman and Egyptian luxury there were wonderful results obtained in working and

A reminder of the success that is still attained by hand and eye in the beautiful matching and work-in of veneers, and also shows how the small shop may within its limits have admirable scope

finishing wood and it was all done by hand.

Two Distinctive Paths in Veneering

There are really two distinctive paths in veneering in relation to this question of magnitude and quality in the business. One is that path that leads to an impressive magnitude of business itself and the other leads to impressiveness in individual work. The small man with a hand

shop has a chance to develop either or both to a certain extent. Magnitude is the thing that comes generally as business develops and grows and it brings with it the machinery and equipment necessary to handle it. Skill in veneering comes from a study and understanding of the business and one may develop as full a measure of skill in a little hand shop doing special jobs as is practical in the biggest institution in the country.

This preamble is written in part to encourage those who are operating in a small way to look up and to feel that instead of being insignificant they are in a way just as important in the veneer business as anybody else, and have just as many interesting things for discussion and have as many opportunities to learn things worthwhile to them from reading about different points in connection with the veneer business as anybody else.

Where New Ideas Originate

Really the economy of management in the veneer business begins right in the hand shop and with hand work. It starts with the little hand glue-pot and the hand brush for spreading. The mechanical appliances are merely modified forms of these and just as the same rules hold in setting the knife on a planing machine that hold in setting a hand plane so do the same principles of glue spreading obtain in the big machines as obtain in spreading glue with a brush by hand.

The one thing for the man using hand pots and brushes to guard against is that of using stale glue. Where a man is using only small quantity of glue there is a disposition to keep it standing melted in his little pot day by day. He adds a little glue or a little

water from time to time and is slow to realise the injury which may be done by retaining stale glue. The idea plan, of course, is to clean up every night, not carry anything over for tomorrow that was used today.

It takes a little time and means wasting a little glue, but it is an excellent practice to clean out the glue pots and the brushes every night, throw away whatever is left over and start in absolutely fresh in the morning. You will feel at first that it is extravagant waste, but by and by if you follow this practice you will get into the habit of gaging the amount of work you have to do each day and will not prepare any more glue than you need.

Wasting Glue to Save It

Consequently, the waste will not amount to much, while the quality of glue work will be considerably above what it would be if you kept using stale glue and leave the pot over from day to day with simply additions now and then. Another thing to guard against is too much cooking of glue. You don't need to cook glue at all. You simply add moisture and heat to glue to reduce it to a liquid form so that it will flow freely, and you should not keep this heating up too incessantly nor get it too hot at any time. If you are not using the glue regularly the heat should be allowed to go down very low so that it is barely kept warm and in condition so that when wanted it can be heated up a little more and made to flow freely in a few minutes. A little attention to a regulation of this kind will save letting the glue boil away all day, evaporating the moisture, getting thicker, and losing some of its strength.

Where there are jobs of some magnitude to do, that is, jobs which involve spreading quite a large surface with glue, one of

the trying things is to get the glue properly spread and the work under pressure before it sets or chills. TO attain this result it is often the case that the glue man will work rapidly, and in his hurry and bustle may neglect to do his work as carefully as he should. There are ways to save time in this or rather to safeguard the glue setting so quick. Of course, the first protection is to have an enclosed room where there are no drafts because a current of air will take up moisture and chill the surface of the glue quicker than almost anything else.

Then, the next best thing to keep glue from chilling is to have your stock warm, even hot. There is really no other strong call to have stock heated when it comes into the glue-room, but the hotter the stock is the longer it will carry the glue in a fluid state and prevent setting. That is why where hand is done it is generally essential to have a hot box in which to heat cauls and the stock to be glued.

With the stock and the veneer and the cauls all made pretty hot from a steam box, that is, from an enclosed box with a steam coil in it, one can take more time and be more deliberate in spreading and preparing the work to go into the presses and insure getting a better job. Sometimes even where the glue seems to have chilled a little and has not set as well as it should one can start it to flowing again by getting a caul right hot and putting it over the thin face veneer. The heat extending through the veneer will warm up the glue and make it flow.

The Steam Bath for Stock

Having stock hot this way when glue is spread on it makes it hungry for moisture

and consequently sometimes it will drink up more of the glue than it would otherwise. If you have plenty of glue on the surface this simply means more glue used, but if the glue is spread rather thin it may mean a poor joint.

There is a way to keep stock from taking up so much moisture out of the glue by sprinkling, sponging, or steaming it before spreading the glue on it. A little wet steam is probably the best thing, if you have a little steam jet in a sort of open box or something where you can steam the wood a little and get the warm moisture out of the glue when spread on it. You will then find that the glue will spread farther and will stand longer without chilling, because the moisture then will stay in it until evaporates slowly into the air.



Working faster and more efficiently with hand tools

By Salko Safic

It's a common misconception that working with hand tools is a slow and tedious project, and the justification of having machinery in both amateur and professional workshops are based on these common misconceptions. Professional woodworkers claim that time is money, and all of us agree upon this statement, but have they been misled by advertisers that machinery is truly faster.

We can come to an agreement that once machinery, or a single machine is setup to perform a repetitive task, it most definitely is faster. Most small cabinet shops don't deal with mass production type work. A successful cabinet shop won't also work with single commissions, but will have a multiple of various commissioned orders with a back log that can run into the years ahead. Still one has to ask is there any truth to this misconception? I would have to say yes and no, yes for thickness planing and ripping long thick material, and no to everything else.

Say you're building a chest of through dovetailed drawers. Will the router get the job done any faster? And again I would have to say no, not for any single project. The task can be quickly and time efficiently done by hand in the same time it would take to set-up a router and a jig.

By developing a good work habit you can avoid simple mistakes and increase your production time by following some examples below.

Arranging your work to suit

You want to keep your work organised, so plan ahead. Be mindful of your workbench, you know its strengths and weaknesses. If you're chopping a mortise, you would choose the corner of your bench as there is more solidity minimising vibrations, noise and softening blow effects than if it were in the middle of the bench. You wouldn't chop one mortise and one tenon to suit, but you would chop all the mortises, while marking each one as you go along with a number or a letter, then make all the tenons to suit again, marking each one that corresponds to each mortise. This will not only speed up your production time but will also eliminate mistakes and time wasting locating what fits where.

The same principles apply to making dovetails. You would employ what we call stacking, where you lay each board on top of each other in a stair step sequence. If you're sawing dovetails you can gang them up in your vice and saw multiple boards in one operation. Frank Krause made a video back in the 90's demonstrating these techniques. It takes Frank 2 mins to saw, chop and fit two dovetailed boards, it would take longer to do the same with a router and jig setup.

When planing, plane all your boards rather than as the need arises, if you can afford to have several planes it would be highly recommended. You can preset these planes according to your needs, you can also save time in sharpening by having several planes, set, sharp and ready to go. Ron Herman a housewright in the United States does just

that.

Another good method is to own several marking gauges set at different settings, here you can save a lot of time without the need to set your gauge constantly.

Unnecessary clamping and unclamping of boards is also a huge time waste, many artisans throughout the ages avoided as much as possible clamping anything on their bench. They would either lean on it or work against a stop, for example if your chopping out some dados, rather than go in and out of the vice, you can have it rest against a stop.

Another overlooked aspect of hand tool woodworking is regularly sharpening your tools in particular to hand saws. It wouldn't be uncommon for a woodworker working twelve hours a day, six days a week not to wear out and replace his saws a few times in his lifetime. By regularly sharpening your saws as soon as you feel a slight degradation in the cut will decrease your sawing time. My new bow saw has a Japanese disposable blade, it cuts very fast, faster than any of my western saws. At first glance I couldn't understand the reasons why until I stopped looking at everything but the obvious. It was razor sharp, so I took my western saws to the vice and took light strokes making each tooth to the same level of sharpness as my bowsaw, none of it took more than five minutes as they were already sharp but all I did was take it to the next level. Immediately there was a notable difference, it cut just as fast, one was not faster than the other. Had I not experience a Japanese saw blade I would never have made this discovery.

One last thing comes to mind, if a particular technique or tool works for you then stick

with it, rather continue developing your skills and efficiency with what your doing than trying out someone else's method because it works for them. Reality is, in some cases there is a right and wrong method, but if a method works for you then stick with it. What works for you might not work for me and vice versa, it all boils down to who trained us or how we trained ourselves.

Woodworking is a repetitive action, you as a craftsman decide what joints your going use and then you repeat it throughout your project. Experience develops from repetitive actions, speed develops over time through muscle memory, and muscle memory develops from repetitiveness. Work smart, not hard and remember, always safety first, if it doesn't feel right; it's not.



The Practical Tests of Hide Glue

Much has been said of late about the testing of glue, its value and adhesive qualities, different grades and makes. Several rules and regulations have been devised to determine the exact value of each glue which are all very good. Nevertheless, most of these tests can only be made with the aid of special appliances made for this purpose. With this fact in mind the writer will give a few simple rules to determine qualities of glues.

First of all, the odour of glue is always considered a good indication of quality. The best grades of glue have a not too pleasant odour but the cheaper grades are practically obnoxious. Usually the cheap bone glues are easily detected through their rank or nasty smell and can be thus judged for their quality in their dry state. Particularly is this true of the powdered or

ground variety. Another test for ground glue is by taking a handful and closing your hand over it. If it gets sticky within a minute or two it is a cheap kind, or made of bones, etc. A good hide glue usually retains its brittle nature for quite a while without getting sticky. A fact worth mentioning is that cheap ground glues always will be found to lump or pack together in warm weather.

Flake glue will act in most instances the same way as ground glue. Another test for flake glue is to take a piece and try to break it. If it breaks easily and with a brittle crack it is a sign of cheap glue. On the other hand, if it proves elastic and can be bent back and forth and is hard to break, it is of a much better quality.

When a piece of good glue is held against the light it should show a perfect clearness and even texture. A cheap glue will show streaks and appear cloudy. Glue, however, should not always be judged by colour, as some of the best glues are of the dark coloured variety.

That white glue is stronger in adhesive qualities than the natural colour is an error, as the white glue is always found to be coloured with mineral pigments. White vitriol or oxalic acid and oxide of zinc are most commonly used for this purpose. This is done solely for the purpose of providing a white coloured glue which in some trades is absolutely necessary. The mixing of any colouring matter has never been found to increase the adhesive quality of the glue.

Glue may be tested for quality as follows: A thin sheet must bend until both ends touch without breaking. If after breaking a sheet of glue the fracture appears in

splinters then such glue has not been cooked properly. If the sheet breaks readily then the glue is weak in binding quality and low in value.

The surface of good glue should be velvety, but sometimes dust falls upon the damp glue, imparting a matte appearance. Never purchase glue that has been exposed to moisture, nor glue that emits an odour similar to that of dead animals.

Irregular bubbles noted in melting glue, when of large size, prove that the material from which such glue was produced had been in a state of decay. If, in cooking, glue of this sort emits a noxious stench it is unfit for use. Even when soaking this glue before melting the disagreeable odour may be noticed. Further proceedings with glue of that peculiarly objectionable odour would only prove to be a waste of time and money, because such glue when used for veneering or glue jointing will blister or come loose in a short time after or joints come apart when such glue is decaying.

R. O. Neubecker



Secrets to become a Master Craftsman Artisan

By Salko Safic

The secrets to become the master is not at all a secret, but one known to us all and reserved only for those who are prepared to undertake a journey I am to reveal or maybe I should say, remind you and myself of something we all already know.

Let's take a brief journey into the philosophical world of martial arts to better understand ourselves and the journey we are about to embark.

Kung Fu

If we look up the definition of Kung Fu we'll get many descriptions, but only one nails its true meaning, "to refine the body and its mind." Kung Fu is supreme skill that can only be attained from hard work. You see Kung Fu doesn't only relate to martial arts but to all that have mastered their trade. A painter Leonardo Da Vinci can be said to have reached Kung Fu, French woodworker Andre Jacques Roubo can be said to have reached Kung Fu. A skilled masterful musician who can move the hearts with his music can be said to have reached Kung Fu. Even a servant who loyally serves his master flawlessly can be said to have reached Kung Fu. Anyone who has mastered the arts be whatever that may be, whose skills have reached perfection and cannot be perfected any further has reached Kung Fu.

Kung Fu is not about fighting but about mastery of the arts. It's about self-discipline, self-sacrifice, struggle, endurance and determination. Strong will power.

Let me give you a quote from a master of Kung Fu of what is needed to reach Kung Fu. "Preparation, endless repetition until your mind is weary and your bones ache, until you're too tired to sweat and too wasted to breathe. That is the way, that is the only way one acquires Kung Fu."

Would it surprise you if I said even those who have worked wood for 40, 50 or even 60 years have not reached Kung Fu, they are merely black belts who know enough to get them by. But I personally want more than that, I don't want just to know enough to get by.

Shaolin monks undergo severe physical training to attain true Kung Fu and it all boils down to that definition to refine the body and its mind.

We are all different in body and mind to each other, many of us are happy and content with their current status, then there are many who want more but are not willing to step forward to get it, but only a few small group want it so bad, that they're willing to sacrifice themselves to undergo severe training of both body and mind to reach Kung Fu. They do this not for fame nor fortune but to attain true skill, self elevation in their chosen art.

I, and I speak for myself only want to achieve Kung Fu, I want to reach a level of mastery in my craft and I'm not referring to become the best of the best because I know all too well, that there is no best of the bests in this world, only God can claim that title. When you believe, you are the best, know that someone some-

where out there is better than you, but to become a true master among many masters is what I want to achieve.

This means going back to basics, relearning simple skills is the key to mastering them, honing with repetition until my mind is weary and my body aches beyond endurance is what I'll have to do to master each skill in this trade. When I saw, there can't be good days and bad days, every day I saw to that line must be perfect in every sense of the word. When I plane the edge to the line it must be square and perfectly parallel to the opposite edge with no severe time lost. My tools must be an extension of my arms and all must work together harmoniously. My knowledge must be pure and extensive with real purpose in mind. To execute an operation, it cannot be clouded with doubt but only with sheer conviction of its purpose and success.

I have built many clocks in my lifetime and many of them struck people with awe, I gained popularity due to my workmanship, honesty, integrity and generosity, so I can never say I wasn't successful in my career as a clock maker and seller. But had I remained content with only building clocks I would never have found myself, my true purpose in life, I would never have discovered what I truly want out of my craft. As you all know there are many aspects of our craft and choosing only one aspect is evidently clear to me now more than ever that that is not enough for me. So, my journey begins on a different route all over again but this time with clarity and single purpose in mind as an apprentice, and am not ashamed to demote myself in order to reach my final destination.

This blog has gone beyond my wildest expectations, it's not about self-promotion or self marketing but about a woodworker who is unknown in this world, who is of no real importance nor holds any celebrity title. It's about a man who has taken upon himself to take a leap of faith into himself, to undertake an enormous journey, a task of determination through self-discipline and hard work to achieve his goals and objectives in life in order to better himself until that final destination of Kung Fu is reached. And you're all welcome to join me should you so desire.



IN THE SHOP

"Life is a hard grind," said the emery wheel.

"It's a perfect bore," said the auger.

"It means nothing but hard knocks for me," sighed the nail.

"You haven't so much to go through as I have," put the saw.

"I can barely scrape along," complained the plane.

"And I am constantly being sat on," added the bench.

"Let's strike," said the hammer.

"Cut it out," cried the chisel; "here comes the boss."

And all was silence – Illustrated Carpenter and Builder

"Do you mean to tell me," said the prospective buyer of the eager dealer in household articles, "that this is a genuine piece of Heppelwhite furniture?"

"Well," answered the eager but honest dealer, "it is a genuine reproduction of a magnificent imitation of samples that are supposed to be genuine Heppelwhites!"

His candor made a sale for him. —
Cleveland Plain Dealer.

Traditional Insulated Windows

By Joshua Stevens aka Mr.Chickadee



One of the purest joys for the hand tool woodworker is the ability to populate ones house with whatever is needed for comfortable living. This joy is greatly sweetened by the freedom of design and wood choice, and made all the more practical by the ability to make much stronger and better quality articles than may be bought commercially.

In the example of house joinery and cabinetry frugality goes hand in hand with longevity and beauty in the most joyous culmination of a craft/art I can imagine. Windows and doors of pure solid wood were the norm for centuries, but have lost favor in our modern world, replaced by cheap plastics and metals, due mainly to ease of mass production and concepts of cheap disposable housing. Another loss we have endured in the name of progress is self reliance. With a few simple hand tools and the skill and knowledge to use them, this independence and freedom so important to our ancestors can be regained and past on.



Our modern manufactured windows have mostly progressed to some form of double or triple glazing, often with some form of argon or other gas inserted in between these panes of glass with the idea of providing a thermal cushion and greater R value, reducing or eliminating condensation, drafts, and hot or cold getting past them. These windows are often very expensive and made of metal and plastic. This arrangement seems to work quite well, until it doesn't, in which case a seal leaks, the window fogs up, fills with water and condensation, and cannot be practically repaired by the home owner, necessitating new windows being purchased at additional high cost. Wooden sash windows can be made quite readily by hand in a straight forward man-

ner, and if we take a long forgotten lesson from the past, these windows can be made very energy efficient as well.

The thermal efficiency and benefit of double glazing was not unknown to people of the past. In fact many well built homes, especially in cold climates traditionally used a “double window” and “double door” system much to the same result as our modern day double and triple glazed units. The large difference here being the units were made with both an interior sash and an exterior “storm” sash separated by an air space. Doors were made the same way with an interior timber door and an exterior “storm” door which serves the same purpose. The addition of functional wooden shutters which can be closed on cold nights adds even a third layer to this fantastic system. The best part of all of course being the home hobby woodworker can make all of these easily and cheaply, and replace any if need be as well!

For our house we decided on a very simple double window system consisting of two casement sashes, one interior and one exterior, with a set of interior wooden shutters. The exterior sash is hinged to open up and out, and can be propped open with some purpose made stick, and the interior opens either inwards and up or inwards and to the side, depending on taste and space requirements.



It is important to note the interior sash should be weatherstripped and sealed tightly, while the exterior sash should be somewhat loose to allow occasional gusts of cold dry air to enter the space between and remove any vapor or condensation. The inner wooden shutters are also well gasketed with a felt weatherseal.



For the general construction of the sash, we first made our frames, quite simply from 2" stock roughly 5" wide for top and sides, allowing the bottom "sill" to be 8" wide stock to facilitate an outward sloping protrusion to carry away any wind driven rain. The frame has a batten placed within which provides a 2" spacing between the sashes. All measurements for the sashes were taken directly off the frame using a "joiners rod" allowing about 1/4" of space all around. We dressed all the rails and stiles to a consistent 1 1/4" X 2" dimension and the single horizontal muntin at 1 1/4" X 1" on 4 sides leaving the stock 1" longer than needed. Then it was a simple matter of laying first all the horizontal members and then all the vertical on the edge of the bench, with reference edges facing all toward me, and holdfasting the joiners rod atop these pieces, then scribing down all the pieces at once with the guidance of a try square.

This step helps immensely with the accuracy of all the layout. These lines are then brought around all four faces of each member with a sharp marking knife and square.

A mortise gauge is then set to the width of our chosen mortise chisel, picked to be a bit over 1/3 the stock thickness, and ran around both ends and middle mortise area keeping the gauge fence referenced from the Face side of each member in turn.

We then made all rip cuts on the bridle joints at each end, sawing just touching the lines, whether inside or out, as one would for dovetailing. The tenon shoulders were left intact for now but the mortises for the center horizontal muntin bar were chopped prior to rebating. We left the tenon shoulders and mortise waste at the ends of each piece intact to give some reference for our sash fillister plane to cut the rebates on.



The sash fillister was then run along each member, having its fence set to cut its rebate just to the edge of the tenon shoulders and mortises at about 1/4" deep. Once this was complete, tenon shoulders were sawn off, and bridle joint mortises were chopped out. We found a small brace bit bored in half from each side of the bridle mortise made quick work of these, then followed up with a few taps of the mortise chisel to clean up worked quite well.



With care the bridle joints can be fit “hand tight” right off the saw, needing no further paring, and the frame is ready to be fit up for pegging together. We used a single 3/8” square peg split from the same heart pine as the sashes were made, offset in two directions (diagonally in toward the tenon shoulder and to the outside of the member) this really helps pull everything up tight as the tapered square peg is driven in. The square peg is sized so that the parallel edges are just the size of the bored hole, but the corners bite into the wood giving a great fit and hold that wont easily come out.



Though the traditional moulded sash profiles with their lambs tongue or ovaloe profiles can be quite fun to cut, they do require specialized planes and very precise scribing to fit perfectly. We have done this style sash in the past, but have since progressed to a more swiftly and simply made sash requiring none of this fiddleing about. As we recognized the moulding as a simply decorative affair, it was a simple matter to cut a stopped chamfer with a drawknife all around the interior aspect of each sash, giving it some decoration, and easing the sharp corner to the eye and hand.



A bit of glazing putty added to each pane and a few appropriate hinges complete the setup and installation. One other thing we did was construct a very basic wooden framed screen which could be placed within the frame while both sashes were open, prevented any insect intrusion or escape of beloved cats. This light screen frame is just placed against the frames separating batten/rebate and held there with a few small pegs and wooden wedges. It can be hung over the window when not in use, or taken down and slid behind a dresser or what have you.



Making your own windows is such a joyfully empowering experience, saving you many hard earned dollars and building wonderful skill and practice. These lovely, functional pieces deserve a place in every home, and the continued preservation of this knowledge is highly important. It was not that long ago we relied on ourselves more to make and fix what we needed, and the modern easy fix is often not the best alternative, and can be a robbery of this joy and independence we all once shared.

For more great work from Joshua visit his blog
<https://mrchickadee.wordpress.com>

Bedroom Furniture in Design and Construction

By John Bovington



EDSTEADS have developed or evolved from other types in a similar fashion to other pieces of furniture and certain lines of development can be traced through the medium of old MSS. prints and wood cuts. There are unfortunately no examples extant of the earliest bedsteads, but there is abundant evidence to show that the earliest form of bedstead was simply a shelf with coverings fixed in an alcove. During the fourteenth century in England this type was much in vogue in the rich monasteries and large houses, where domestic furniture was of a more advanced kind than that in the baronial hall and castles, which was of a rough and ready description, quite in accordance with the warlike proclivities of its users.

Chests and the Canopied Bedstead

There is a manuscript in the British Museum which gives one a good idea of the fifteenth century bedstead. This appears to be of the truckle description, and it is rendered more ornate and fitting for a fine bedchamber by having a canopy suspended above, the latter draped with embroidered hangings.

Parallel with both the types mentioned above was the chest, which served a double purpose, i.e., seat by day and bed by night.

During the latter part of the sixteenth century and also in the seventeenth century, the canopied bedstead was much in vogue. These types were rather different to the four-poster bedstead of a later age, in which four ornamented posts were the characteristic feature.

The "four-poster" pure and simple, with four posts, tester or cornice and dimity hangings, is essentially a product of the eighteenth century. They were produced largely by Hepplewhite, Sheraton and some of the lesser known designer craftsmen of the eighteenth century.



Fig. 1. A Canopied Bedstead of the Late Sixteenth Century

There are several examples of this kind extant, one notable example being finely inlaid and dated 1568.

Further details of bedstead design and construction and presents certain ingenious and attractive arrangements of the old models

teenth century.

The bedstead shown in the illustration, Fig. 1, is now in the Victoria and Albert Museum at South Kensington, London. and is more accurately termed a tester Or canopy bedstead. "Tester" is another name for cornice or canopy, and, as in the example illustrated, it was supported by means of two elaborately fashioned pillars or "posts" at the foot end with a panelled support at the head. Draperies or curtains were often fixed to these bedsteads, a fashion which still survives at the present day.

The bedstead illustrated is dated 1593 and bears the arms of an old family of Courtney in Devon. The panelled work generally is good, but the carved supports underneath the "baluster" turnings are rather overdone, and the masks or heads above the tester are rather more weird than artistic. About the same time the fashion of built-in bedsteads commenced, it being quite a usual thing to design the bedstead in the same style as the panelled woodwork of a room, fitting it in as part of the general decorative scheme. Fine carved, inlaid, and decorated pillars are characteristic; these pillars were much sought after a generation ago, when they were converted into palm-stands by adding a base part and a top. Many fine bedsteads were disposed of in this way, but the value attached to good four posters at the present day fortunately prevents further vandalism of this kind.

In Fig. 2 is shown a prospective design for a wooden bedstead which embodies some old features of bedstead construction. The head and foot part of this example resembles to some extent French productions of the eighteenth and nineteenth centuries, and bedsteads of this particular type are frequently referred to as French bedsteads, although many of this kind were made in England and the European continent during a corresponding period.

Background and Bedstead

An interesting new feature is shown in connection with this design, i.e., the curtain suspended as a wall hanging immediately behind the head part. This acts as a suitable background for a richly coloured bedstead and gives a much more imposing appearance to the bedstead. The colouring of the hanging should of course harmonize with the general colour scheme of the room, and if plain walls or simple stripe papers are used, it affords an opportunity for a piece of rich colouring and design which gains considerably by contrast with the plainer walls.

Veneering and Recessing

In Fig. 3 is shown the necessary working elevations and details, from which it will be seen the veneering and recessing are the two main decorative features. Quartering is made much of, this process being both constructive and decorative. Carving out tools. The slab is then

squared up, doweled and glued between the posts and then the centre pilaster is glued down. A cap moulding as shown is glued on to the top edge and a cabriole leg base with moulding fixed at the bottom. The method of executing the latter was described in an earlier article and is practically identical with the description there given. The head part of the bedstead is shaped at the head end with a capping moulding fitted at the top.

Feet, Panels, and Posts

The foot end is simpler in general outline, and has cabriole feet to keep it in character with other pieces of the suite, dealt with in an earlier number. To construct the foot, end a large laminated panel should be prepared of five ¼ -inch thicknesses of mahogany, well glued together, with the grains running alternately, and allowed to thoroughly dry in a press or clamp for some two or three days before taking it out. The latter process insures the slab remaining perfectly flat after it has been worked upon. This slab should then be planed quite true and gaged to thickness, after which it is toothed and sized prior to veneering. The veneers should be fitted and glued down to two sheets of paper, which when quite dry are glued down to the slab. On the inside of the slab an ordinary quartered device should be executed. Two square posts are then prepared and a ¼ -inch thick pilaster for the centre part, the recessing being set out with gages and compasses, or a tracing of the

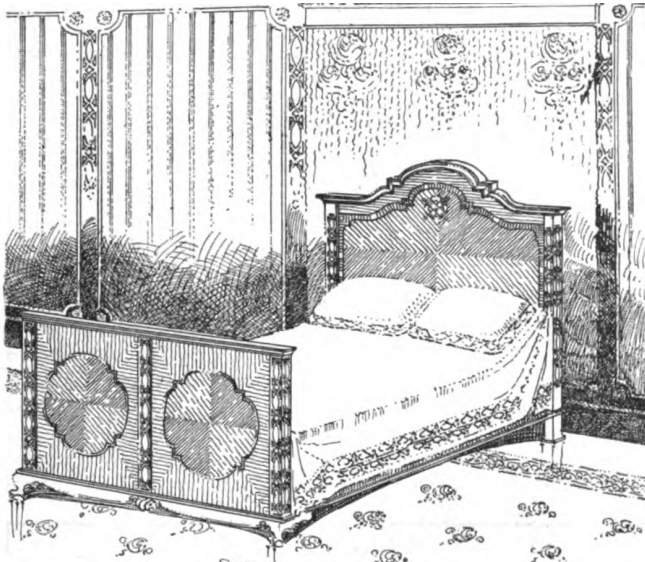


Fig. 2. Perspective Sketch of a Wooden Bedstead With Veneered and Recessed Decoration

decoration can be glued down to the work. If a recessing machine is available they can be worked with this, or alternately carved with gouges and grounding out tools. The slab is then squared up, doweled and glued between the posts and then the centre pilaster is glued down.

A cap moulding as shown is glued on to the top edge and a cabriole leg base with moulding fixed at the bottom. The method of executing the latter was described in an earlier article and is practically identical with the description there given. The right-hand view shows the head end in two stages.

That on the left-hand side represents the head when framed up with a shaped top rail and two bottom rails; this is quite a usual construction, and the space is of course concealed when the bed is in position. Two rails are grooved upon the inside (see sectional view), in order to receive the veneered panel, which is bevelled on the rear side in order to reduce the edge to the necessary thickness. A fretted and carved device is shown in the centre of the head panel, which is effected by cutting through on a fret machine (scroll saw) and then carved up to obtain the necessary modelled feeling. It will be seen that the top of the post sets down below the top line of the rail. This is necessary in order to fit the square pieces of capping moulding, which should be doweled down to the posts in the position shown in the small diagram above the post. Before this block is glued on it should be mitred on the inside in order to receive the front piece of moulding im-

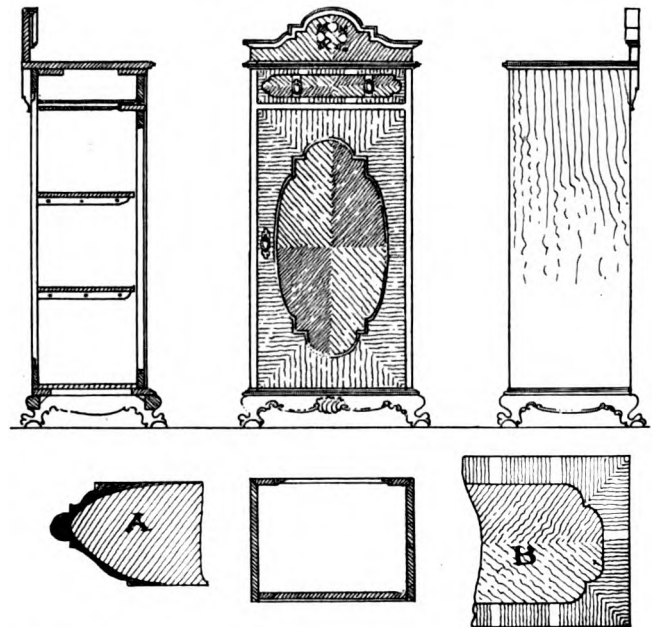


Fig. 5. Details and General Views of a Pedestal Cupboard
mediately adjoined, which is glued down to the face side instead of on the top edge.

Moulding, Rails and Bars

The small diagram shown represents a moulding on both sides which is the correct detail for the foot end. At the head end it is only necessary to plant the mouldings on one side, leaving the back-side level, as is shown in the side view. In the side view of the bedstead a wide rail is shown connecting the head and the foot; this is the French method of connection, which is now being superseded by various iron attachments, patented and otherwise. One of the patented devices is that known as the "Vono" fitting, which does away altogether with side rails. Bars are fixed at each end of the bedstead, and the iron side rails are connected to these by simply bolting them together. It is surprising, considering the simple connection, how much rigidity can be obtained. Other connections are similar in their general features, but usually rely upon a dovetailed joint in iron for the connecting part, which necessitates the use of a mallet or hammer and necessarily some risk of fracture. An enlarged view underneath the side view shows the main feature of a proper French connection. Two threaded nuts are sunk into the post, the holes coming in line with two holes previously bored to take the bolt. The end of the rail is stub-tenoned into the post in order to secure the correct po-

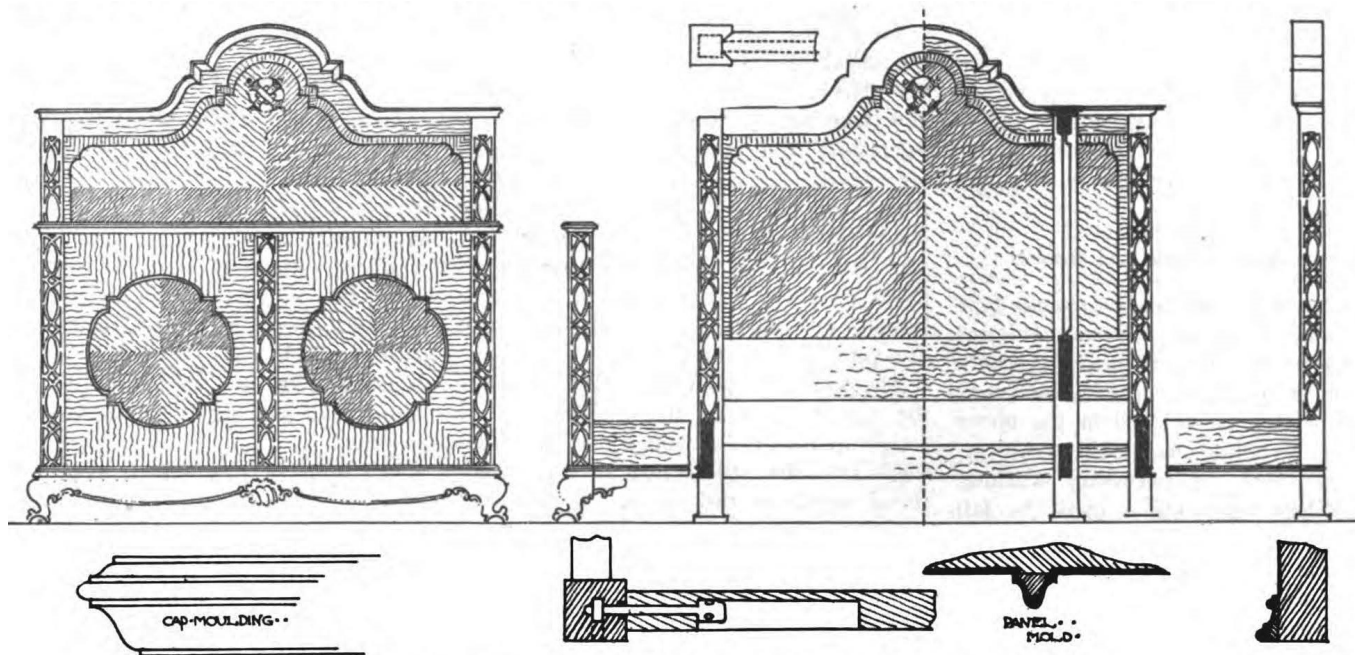


Fig. 3. Elevations and Working Details of the Bedstead Shown in Fig. 2

sition, and then two bedstead bolts must be fitted into the rails so that the ends project

inside the leg. A small "tommy" is employed to turn the bolt, the holes in the head be-

be cut and fixed into the underside of the feet. A good plan is to have a projecting pin

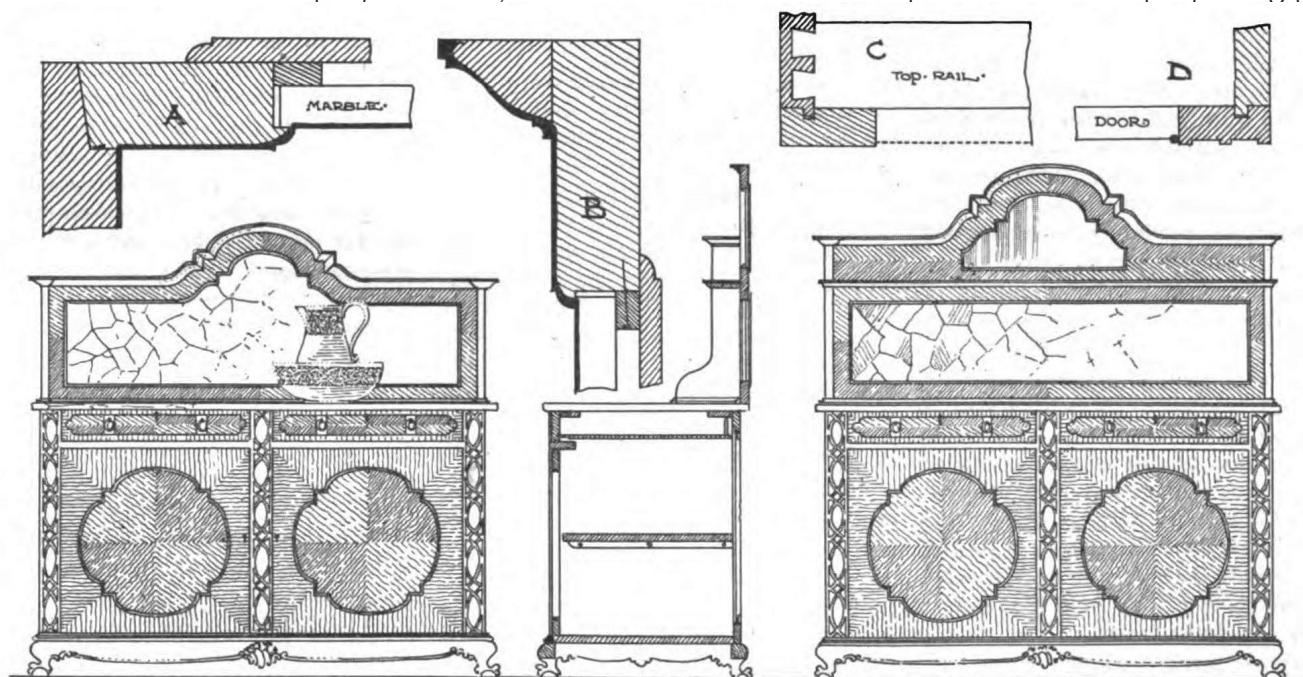


Fig. 4. Elevations and Working Details of Washstands

beyond the stub tenons. This is effected by cutting a neat channel in the rails and then boring through the ends into the channel.

It will be understood that the bolt can then be laid in the channel and the end pushed through into the threaded nut

ing for this purpose.

A moulding should be glued to the bottom edge of the rail and cut level with the shoulder; a small bracket at the end of the rail is also essential in order to finish off the cabriole leg part. Casters are desirable on bedsteads of this type, and should

turned on the underside, when a short socket caster can then be employed to advantage. The washstand is essentially a comparatively modern type of furniture, and has not so many interesting forerunners as other kinds of furniture generally. Some were produced during

the eighteenth century by Chippendale and Sheraton, but the few existing pieces do not show any particularly artistic detail, and by comparison with other furniture they have been sadly neglected. The washstand of the Sheraton period was usually a small cupboard or cabinet with a lift-up top or lid inclosing a basin, soap dish, etc., while a door in the bottom part in closed a cupboard containing a receptacle for the waste water.

Washstands, Simple and Ornate

Washstands of a somewhat similar type are now used in ship cabins, the latter of course being rather more elaborate from the point of view of convenience. A small cistern is inclosed in the upper part, and a falling flap with basin attached provides the necessary washing place. When the water is used, the fall is simply raised and the water falls into a receptacle placed in a bottom cupboard. 'Efficiency and economy of space are the two things chiefly considered, and the shape of these washstands acts considerably against their value as artistic assets.

During the eighteenth century, there were some corner washstands made, but the washstand of today was practically unknown. The nearest approach we have to the modern washstand in historical woodwork is probably the French commode, which was largely in evidence during the Louis XV period.

A French commode is really a large chest of drawers with a marble top which, it will be understood, answered admirably as a washstand when used in conjunction with toilet china. These commodes are usually curved in plan, and some examples exhibit remarkably good veneered, inlaid and carved ornament.

In Fig. 4 are shown two examples of washstands designed to harmonize with the furniture previously described. The first has a bottom part almost identical to the dressing-table. A marble slab is introduced for the top, and the back frame also has a marble slab or panel to match the top. It is of interest to note that panels of this type fixed in frames are much thinner than the tops. A $\frac{1}{2}$ -inch marble is quite sufficient, and most marble masons stock marble of this thickness specially for the purpose.

The frame is mortised and tenoned together with a moulded detail as shown in diagram A, in Fig. 4. This diagram also shows the marble lapping over the moulding, with small soft wood blocks fixed at intervals to keep it securely in position. A $\frac{1}{4}$ -inch mahogany or 3-ply back with rounded edge and shaped to correspond with the panel shape is screwed at the back.

Diagram A also shows the frame rebated into one of the side brackets, this being screwed into the rebate. The moulded detail of the back is

executed similarly to the bedstead, the curved pieces being glued on to the face side, and the "returns" or bracket caps worked in the solid and doweled down to the brackets.

To fix the top part to the marble top, the usual plan is to bore holes through the marble, countersinking the underside, and then the top part is screwed from underneath. The right-hand design shows an alternate design for a washstand to match the pieces of furniture previously dealt with. In this piece, the special feature is a mirror in the top part placed above a shelf. Such mirrors are now largely introduced into washstands and are very convenient.

The end sectional view in Fig. 4 shows the construction of the top frame. A wide top rail and a bottom rail are tenoned into the stiles, and as the exceptional width of the top rail is likely to cause twisting or casting, steps must be taken to keep it straight. In this particular instance two pieces of hard straight-grained wood should be slotted or keyed into the back of the wide rail as nearly as possible in line with the curves and meeting in the centre at the top.

As an additional safeguard, it would be well to veneer the back of the frame as well as the front. The shelf, it should be noted, should be slip-dove-tailed between the brackets with return mouldings mitred into the moulding worked

along the front edge.

Diagram D in Fig. 4 shows the method of connecting the carcass end to the pilaster at the front, while diagram C in the same figure shows the connection of the top front rail which is lap-dovetailed into the carcass end and set back so that the drawer front conceals the edge of the top rail. The dotted line in this diagram indicates the line of the drawer front.

The cupboard doors in the bottom part should be mitre clamped and veneered on both sides for additional security.

Construction of Bedstead Cupboards

Fig. 5 gives elevations, sectional view, etc., of a pedestal cupboard, sometimes also referred to as a bedside cupboard. The constructive features of this piece are quite simple, the main part being a carcass lap-dovetailed together and fitted with a one-panelled back as is shown in the sectional plan.

The construction of the stand has been fully described in an earlier number and the doors also follow the processes already dealt with. A pediment is attached to the top, and this should be made in three pieces, that is, a rail is tenoned between two stiles, the latter being shaped to act as horns or fixing pieces, as is shown in side and sectional view.

These pediments are frequently made to screw from underneath the top, in which case the horns can be dispensed with. Two shelves are provided inside, supported upon fillets of $\frac{1}{2}$ -inch mahogany. The pediment is veneered with two pieces of splayed veneer and a fretted and carved centrepiece is introduced as in the bedstead dealt with.

Ornamenting Doors and Drawers

An enlarged detail of the top moulding is shown (see diagram A), while B is an enlarged view of part of the drawer front. Between the crossbanding and the quartered canter part a black line is introduced, while a cocked bead placed round the drawers and doors would prove an ornamental and useful detail in all the pieces. Cock beads prevent the veneer chipping and showing a rough edge in addition to proving a decided ornamental feature.

The door of this cupboard and indeed all the cupboard doors distinct from the large wardrobe door should be secured by means of bullet catches. These acts simply, and if properly cut in prevent any play, and the doors may be more easily opened and shut than by any other method.



Fish Glue still holding Strong



Well I promised to do an extreme test of this lower grade Lee Valley Fish glue I've had for a number of years. I've placed the glued up test pieces in the laundry when my wife had the dryer on and placed them next to the dryer where the moisture levels are at their extreme. I left it there overnight and much to my surprise they were still bonded with no movement of trying to pull them apart.

So with everything I have read, all the negative hysteria of joints falling apart placing all the blame on the glue for its failure, I am not convinced it was the glue's fault at all, and will not speculate as to why it failed for others other than the strong possibility it's the user's fault. There are many factors at play to cause glue failure and some of which I noted in my previous post, if people choose not to use themselves well in the products they use then they simply cannot put blame on the product but themselves.

Salko Safic, Qld. Australia



The Principles of Design

There are three fundamental rules in designing furniture: Rhythm, Balance and Harmony, according to Fred D. Crawshaw who has based his theory on E. A. Batchelder's book "The principles of design".

Here is an excerpt from a book I'm reading dated 1912 for teachers of woodworking, I feel that many of you may find this beneficial in understanding the fundamental laws of furniture design which you may consider when drawing up your own furniture designs. Even if you don't design one yourselves you will at the very least have a better understanding of furniture design concepts and be able to differentiate between a good design and a bad one.

Steps to take in designing a piece of furniture

In response to a need for a piece of furniture consider carefully it's detailed use.

Determine the material to be used in construction. In general, close grained and fine textured woods are most suitable for furniture which has a limited use such as parlour and bedroom pieces. The courser grained woods have their principle use in living and dining room furniture. Again, the close grained and hardwoods are best suited to pieces of furniture having many curved lines formed either by modelling or turning. The courser grained woods should be used principally in furniture of severe design.

Determine, if possible, the place a piece of furniture will occupy in a room. This will fix some of the definite dimensions and will enable one to make a wise selection of the kind of lines to be used that the piece may be harmoniously associated with its companion pieces.

"Block in" the design so as to make the piece of furniture harmonise with the general "make-up" of the room. Secure the harmony by having a re-echo of the line.

Consider now the indefinite or detailed dimensions to make all parts of the piece members of one family. This will result in unity. All details

such as the modelling of top and bottom rails, the use of curves in stiles and legs, the modelling of feet and top of legs or posts, and the making of metal fittings, etc., will affect this element – an all important one – in the design. Make good constructions and proportion serve as an important factor in the decoration of the piece.

Before considering the design complete, give careful attention to the three fundamental elements of design: viz.: rhythm, balance and harmony. If the several parts are so arranged and formed that there is movement as the eye passes from one part to another in the design, then rhythm has been secured. If, by having the whole arranged symmetrically with respect to an axis or by a judicious arrangement of parts, the whole seems to stand or hang truly, there is balance. If the design as a whole does not "jar" upon one; if all parts seem to belong together, then there is harmony. The design is a unit.

Correlation in Design

It is believed that no better line of work can be introduced in conjunction with woodwork than that commonly called "Decorative Metal." Many woodwork constructions are enriched by the addition of some escutcheon – a strap, a hinge, a pull or a corner plate. The making of these metal fittings may be considered a legitimate part of a course of study in woodwork, especially one in which emphasis is laid upon the design and construction of furniture. It is believed there is no line of work which offers a greater opportunity for the teachings of the principles of design and for their application than this. There is, too, not only an opportunity but a demand for close and natural correlation between furniture making and its associate, decorative metalwork.

General lines and Proportions

The general character of the lines will be largely dependent upon the lines in the pieces of furniture with which the one you are designing is to be associated; there should be a general

harmony of line, a re-echo of line, in the room as well as in the single piece of furniture. The general proportions will be determined by the space your piece of furniture is to fill and its use. In case it has no particular place in the home or there is not a decided need for it, a design is not called for. It is believed that much of the furniture of either poor or mediocre design is the result of a misdirected effort due to a misconceived or purely mercenary demand.

Construction

The shape of the piece of furniture will generally determine its construction. One will hardly make a mistake in the selection of joints to be used, but there are many forms of some of the principle joints, such as the tenon and mortise joint, from which to select. Here, again, one must be governed by that fundamental law of design, viz., there must be harmony.

If the general design is a severe one, then the protruding form of joint will be appropriate, such as, for example, the open or pinned tenon and mortise joint instead of the closed one or the screwed construction instead of the nailed butt joint, etc.

Construction is no less an important factor in the ultimate beauty of a piece of furniture than is its design. The best designed article may be ruined by poor constructions. Makeshifts such as glued on parts to represent protruding tenons and pins are deprecated. The butt joint fastened by means of screws or lag bolts may be an appropriate form of construction and decoration, but it should not be used as a general substitute for the tenon and mortise. It is a false interpretation of honest construction and is one of the many things in manual training which helps to swell the number of those who condemn the subject for its insufficiency and impractical methods.

Decorative features

Simple carving, upholstering or textile or leather panelling is often the thing needed to give a piece completeness in appearance, but, ordinarily, good lines, good proportions and good

finish are quite sufficient to fulfil all aesthetic requirements. The simple modelling of the top or bottom of a post and the introduction of broken or curved lines in some of the rails and stiles is sufficient decoration.

In addition to these three considerations, it is desired to call attention to two others dependent upon one or all of these three:

There will constantly arise as one works over a design the question of widths and lengths of certain parts. Some of these will be definite because of the use to which the piece of furniture will be put, but many may be determined with some degree of accuracy if one will carefully consider the three following laws governing arrangement. Uniform spacing of similar parts is usually unsatisfactory.

Wide masses and narrow openings should be made near the bottom of a piece instead of near the top to give the feeling of stability.

The centre of weight in a design should be directly below the centre of gravity.

The satisfactory of filling of space areas is often difficult. This is largely a problem in decoration although it may be one in construction when the strength of the piece of furniture is an important factor in the design. As an aid toward a satisfactory of arrangement of parts in a given area the designer should become familiar with the term "measure" and the principles in design affecting it, viz., rhythm, balance and harmony, as set forth in E.A. Batchelder's book, "The Principles of Design."



The Golden Age of French Furniture in the Eighteenth Century

By Daniëlle O. Kisluk-Grosheide

Department of European Sculpture and Decorative Arts, The Metropolitan Museum of Art

Some of the most beautiful and refined furniture ever made, displaying the highest level of artistic and technical ability, was created in Paris during the eighteenth century. Much admired by an international clientele, it was used to furnish residences all over Europe and also influenced fashions of cabinetmaking outside France.

Furniture-Making Guild (Corporation des Menuisiers)

French furniture of this period was the collaborative effort of various artists and craftsmen who worked according to strictly enforced guild regulations. Established during the Middle Ages, the guild system continued with little change until being dissolved in 1791 during the French Revolution. The Parisian guild to which the furniture makers belonged was called the Corporation des Menuisiers. It had great influence on the education of furniture makers by requiring at least six years of training that led to a high degree of technical specialization and ensured a high standard of work. First an apprentice spent three years or more in the workshop of a master furniture maker, followed by at least as many years as a journeyman. In order to become a master, a journeyman had to prove his competence by making a chef-d'oeuvre, or masterpiece. Once that was successfully completed, he could open his own workshop only if a vacancy existed (the number of masters allowed to practice at one time was strictly controlled by the guild, as was the size of their workshops) and he had paid the necessary fees. The dues were lower for the sons of master cabinetmakers than for people from outside Paris who had no relatives in the guild. From 1743 onward, it became the rule to stamp every piece of furniture that was offered for sale with the maker's name. An additional stamp, JME (for jurande des menuisiers-ébénistes), would be added once a committee, made up of elected guild members who inspected the

workshops four times a year, had approved the quality. Any furniture that failed to meet the required standards of craftsmanship was confiscated.

Menuisiers and ébénistes

The Corporation des Menuisiers was divided into two distinct trades, that of the woodworkers who made paneling (boiserie) for buildings and coaches, and that of the actual furniture makers. The latter can be subdivided into menuisiers (joiners), responsible for the making of solid wood furniture such as console tables, beds, and chairs, and the ébénistes, from the word ébène (ebony), makers of veneered case pieces. Most of the menuisiers were French born, often members of well-known dynasties of chairmakers, and were located in or near the rue de Cléry in Paris. By contrast, a large number of Parisian ébénistes were foreign born, many of whom worked in the Faubourg Saint-Antoine. Although not forbidden, it was rare to combine the professions of a *menuisier* and an *ébéniste*.

In addition, there were two other groups of furniture makers active in Paris, working outside the framework of the guild. The so-called royal cabinetmakers, who were given special privileges and workshops either at the Louvre palace, at the Manufacture Royale des Meubles de la Couronne at the Gobelins, or in other buildings owned by the crown. Royal cabinetmakers were free from guild regulations. The second group consisted of the so-called artisans libres, or independent craftsmen, many of them foreigners who sought refuge in certain "free" districts of Paris outside the guild's jurisdiction.

The Aesthetic of Formality

By Brian Holcombe

My name is Brian Holcombe, I am a professional woodworker from Princeton, NJ, USA. I design original work and build it by hand. In this article I will discuss an often debated topic amongst furniture makers; visible joinery.

Having spent my late teens in an automotive machine shop, I started woodworking with what I had available to me; a Bridgeport milling machine, a set of router bits and home center bandsaw. I created my first piece of furniture using these tools and as my work continued I began to acquire more tools, handheld machinery and small stationary machines among them, but each acquisition still left something to be desired. I could not achieve the accuracy I wanted, nor did I desire to spend all of my time holding a screaming router. I needed another approach and I could not warehouse the kind of machinery that I really wanted. I wondered how did the woodworkers of the past build great works accurately without reliance upon machines?

As I began to research I came across videos of Japanese furniture makers known as sashimono-shi. I began to admire how they worked with such assurance in their own ability, quickly utilizing hand tools to build beautiful and accurate works. I knew then what I wanted from my woodworking experience. I decided that it was time to put down the machinery and take up hand tools, first using only a few, then as my tool box expanded I began working near entirely by hand. My goal was to provide myself with an apprenticeship of my own teaching; researching hand work and teaching myself how to complete it.

As I continued using hand tools and building furniture I would often watch those same videos again each time acquiring a new tip on their approach or their design work. I took notice that the sashimono-shi hid nearly all of the joinery that they cut. They utilized secret mitered dovetails at the corners of their casework along with blind cut mortise and tenon joinery. They were making efforts not only to hide the joinery, but the designs themselves were almost always formed to hide evidence of their construction.

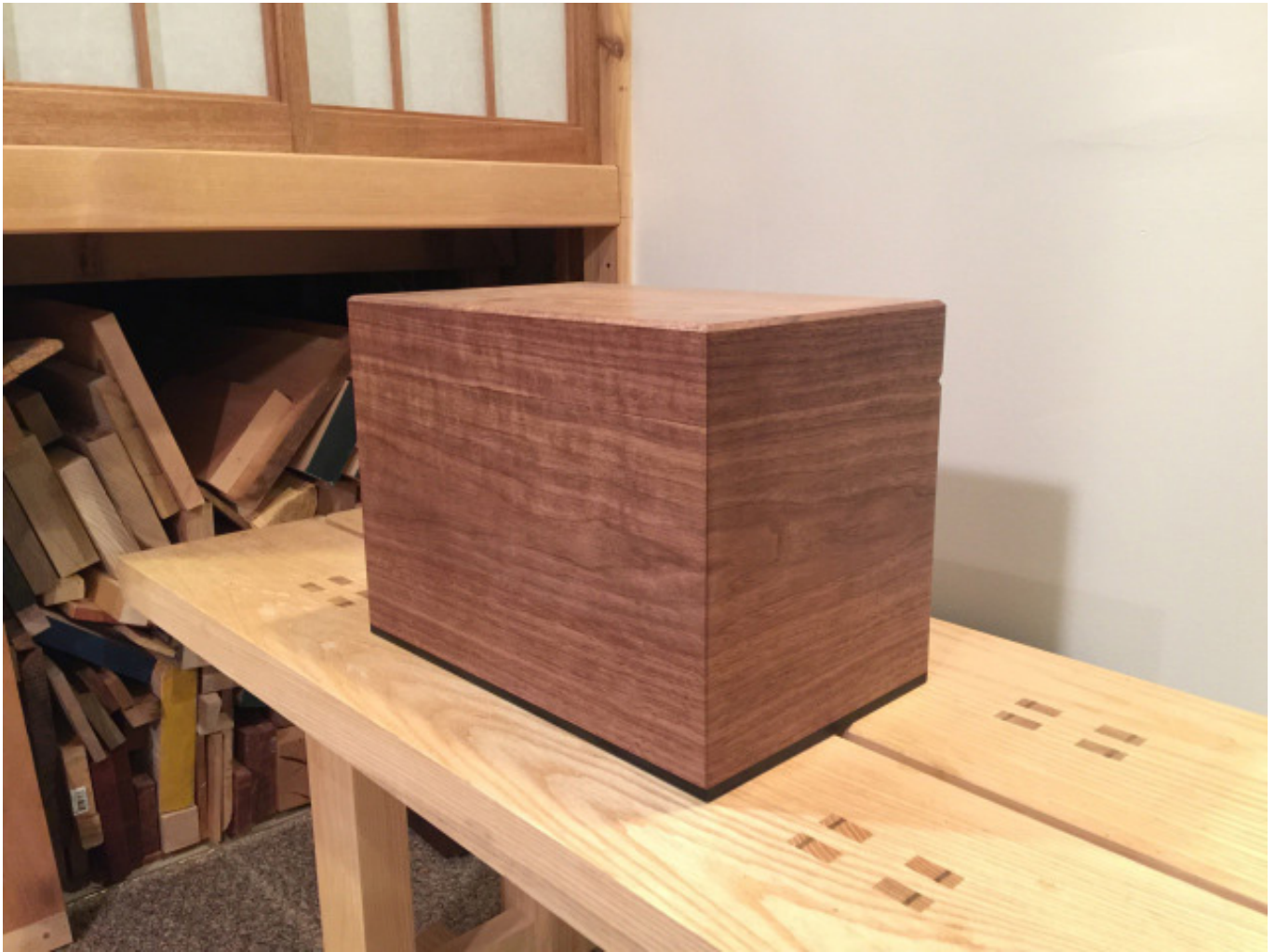
I began to understand their desire to completely disappear from their work and let the mastery of its execution speak for them. Those who knew how the furniture was constructed could rest assured that a mitered corner was hiding a series a dovetails and a butt joint likely hiding fox-wedged tenons. They did not need to show the joinery as seamless execution alone was only able to be performed by someone especially skilled and those skilled were sought after for their work.

As a designer who happened to work wood, my original desires were simply to realize my designs and only a basic consideration for the materials was required. As I progressed and improved in woodworking skill the thought of joinery and process became increasingly important. I began to realize that I was not simply creating an object out of wood but that I could create an object which best utilized the properties

of wood to realize its form. Those silent teachers were again guiding me through another lesson.

When an object happens to be made of wood there is little consideration for the medium, one would be just as well making it from composite materials or plastics and the end result would be the same. However when we utilize wood in all of its characteristics we begin to realize that the properties of the wood dictate exactly how we go about this process. The format for planning must include process and not simply end result. The way in which a piece assembles, for instance, must be carefully considered.





My debate as both woodworker and designer is exactly how much of this I should reveal in the finished product. In an age when a long miter joint is assumed to be hiding floating tenons or dowels and not a neat row of dovetails, does it matter if my work reveals the efforts made? Is the result alone enough, or should we show the method of construction? Do we not face similar challenges as those who created the arts and crafts movement and pushed back against the hurried and poorly considered objects being created by the industrial revolution.







The craftsman is effected in his design by what can be produced in mass. The industrial machine competing to appear as handcraft and the craftsman continually moving forward to ensure that his efforts are recognized. This presents a question however, is this reactionary process truly design?

Should we not build as we see best fit, showing joinery as a hint rather than a dominating element of our design. Do we not do ourselves a disservice by shouting what should be spoken and by speaking what should be whispered? Building by hand in itself does effect how we create a design, should that not be what speaks for our efforts?



I feel that we should do away with reactionary process and instead consider the purpose of the piece. In my estimation woodwork is always done on a sliding scale of formality and as the work becomes more formal it should begin to hide away the elements of its construction much in the way formal structures hide away the elements of their construction. Sashimono and shoji, for example, are very formal work and as such present a polished appearance. The sashimono-shi famously hiding away intricate dovetail work to present a seamless facade and the tateguya utilizing joinery such as the blind cut double tenon with mitered shoulder to allow a continuous chamfer on the interior of the stile and to better hide away the joinery used to construct the shoji frame.







Japanese gardens often express their structural connections in a more forward fashion. It is in the spirit of this work that I create more informal works with visible structural elements. These structural connections lend elegance to otherwise basic form, providing along with it structural integrity and the image of strength.







Once a balance is struck we can refine our result by pursuing efficiency as our ancestor woodworkers did. I feel it is in their search for quality and efficiency, balanced against their classically proportioned aesthetic that ultimately created such impressive works. Works often part and parcel with their handmade nature, though showing much of or very little of their structure.

Brian is a fulltime professional cabinetmaker and teacher. For information on Brian's classes you can contact him through his website.

<https://brianholcombewoodworker.com>

Bombe Desk and Bookcase

By Robert D. Mussey, Jr.



Artist/Maker

Frothingham, Benjamin
(1734-1809)

Date Made

1753

Place Made

USA: Massachusetts,
Charlestown

Materials

Wood; Mahogany; White
Pine; Eastern Red Cedar;
Spanish Cedar

Measurements

98 1/4"h. x 44 1/2"w. x 24
3/4"d.

Until its gift to the Diplomatic Reception Rooms, this imposing piece had never been published by furniture scholars. It ranks as a virtual icon of Boston furniture of any period and is the first documented piece of bombé-shaped furniture made in America. It is perhaps one of the first examples of Chippendale-style furniture made in the colonies, predating the publication of Thomas Chippendale's *Gentleman and Cabinet-Maker's Director* by one year. The desk and bookcase is also the earliest piece documented to Benjamin Frothingham of Charlestown, Massachusetts. It is presently the only known piece of American furniture of any form with molded architectural feet of this pattern.

The bombé form derived from a shape commonly used for ancient Roman sarcophagi. The form was adopted in the sixteenth century by Italian craftsmen and in succession by Dutch, French, and then English workers, each in characteristic fashion to suit national taste. Boston craftsmen, with their strong loyalty to English design sources, in turn embraced the form as suitable for merchants and citizens of wealth and importance. Judging from the list of Boston owners, display of this costly form must have been almost *de rigueur*. The style enjoyed popularity well into the 1780s, thirty years after being superseded in England by newer fashions.

Frothingham was twenty years old when he made this piece. His liberal use of engraved labels later in his career has led to voluminous research by furniture historians. But little is known about the owner, Dr. Sprague. He and Frothingham were members of the First Church of Charlestown and were also founding members of "The Ancient Fire Society," a private fire protection group. Both sustained considerable losses when the British burned Charlestown. Upon his death in 1766, Sprague was owed more than £58 by Frothingham's father, a debt later settled by Benjamin, Jr., as estate administrator.

The desk and bookcase shares a number of characteristics with high-style blockfront furniture made in Boston in the late 1740s and 1750s. The waist molding surrounding the midsection of the lower case follows common English practice of the day, a hold-over from earlier methods of constructing the desk portion in two separate pieces.

Although Frothingham borrowed from the standard Boston design vocabulary of the day, his unique use of molded architectural feet displays his innovations in adopting elements of the latest English details. The exact model he followed is unknown, but another American desk and bookcase, nearly identical in all respects, including molded feet, may have inspired Frothingham's masterpiece.

Drop-front secretary (Secrétaire en armoire)



Maker:

Jean Henri Riesener (French, Gladebeck, near Hessen 1734–1806 Paris)

Date: 1783

Culture: French, Paris

Medium: Oak veneered with ebony and 17th-century Japanese lacquer; interiors veneered with tulipwood, amaranth, holly, and ebonized holly; gilt-bronze mounts; marble top; velvet (not original)

Dimensions:Overall: 57 × 43 × 16 in. (144.8 × 109.2 × 40.6 cm); Other (length of key): 3 5/8 in. (9.2 cm)

Jean-Henri Riesener created this splendid secretary and commode for Marie-An-toinette in 1783. They were commissioned for the queen's Grand Cabinet Intérieur at Versailles, where she kept the collection of Japanese lacquer boxes she had inherited from her mother, Empress Maria Theresa (1717 – 1780) of Austria. So that their surface decoration would harmonize with that of the boxes, choice fragments of seventeenth-century Japanese lacquer were reused as veneer for these pieces of royal furniture. The shiny black and gold lacquer and lustrous ebony form a striking background for the exceptionally beautiful gilt-bronze mounts (see detail page 102). Consisting of swags and interlaced garlands of naturalistic flowers, these jewel-like mounts incorporate the queen's initials in the frieze as well as handles shaped like rippling ribbons. Enclosed behind the fall front of the secretary, several secret drawers are hidden beneath the hinged floor of the central compartment. These small drawers, as well as a strongbox that could be locked separately, offered places to store valuables and protect personal correspondence from prying eyes. The queen undoubtedly used them, for she never believed any papers were safe at the court, according to the Austrian diplomat Florimond-Claude, comte de Mercy-Argenteau (1727 – 1794). He had reported to her mother many years earlier that the dauphine was fearful of duplicate keys and apprehensive that things would be taken from her pockets at night.







The history of these famous pieces of furniture is remarkably well documented. Marie-Antoinette frequently changed the decor of her private rooms, and in 1787 she had the commode and secretary sent from Versailles to her new summer palace at Saint-Cloud.



Both pieces left the royal collections when they were given in lieu of payment for his services during the Revolution to Abraham Alcan, a contractor of supplies for the army of the Rhine and Moselle. During the nineteenth century, the queen's secretary and commode were part of several notable British collections. George Watson Taylor (1770 - 1841) kept them at his country house, Erlestoke Park, in Wiltshire, and later they belonged to the dukes of Hamilton. At the famous Hamilton Palace sale of 1882 the royal pieces were acquired for Mrs. William Kissam Vanderbilt (1853 - 1933), one of the reigning society hostesses of New York City, for her mansion on Fifth Avenue. Her daughter Consuelo Vanderbilt Balsan (1877 - 1964) remembered Marie-Antoinette's lacquer secretaire and commode standing in the white drawing room, which was hung with a set of Boucher tapestries.





















High chest of drawers



Date: 1762–65

Geography: Made in Philadelphia, Pennsylvania, United States

Culture: American

Materials: Mahogany, mahogany veneer, tulip poplar, yellow pine, white cedar

Dimensions: 91 3/4 x 44 5/8 x 24 5/8 in. (233 x 113.3 x 62.5 cm)



The naturalistic carving on this tall chest is the work of highly skilled London-trained craftsmen who came to Philadelphia before the Revolutionary War to seek their fortunes. Characteristically, these makers took motifs from London pattern books and rearranged them to suit local tastes. Thus, the scroll pediment with finial bust and cornice moldings were taken directly from illustrations in Thomas Chippendale's famous "Gentlemen and Cabinet Maker's Director" (1762), the serpent-and-swan motif in the central bottom drawer from Thomas Johnson's "New Book of Ornaments" (1762).





Hardanger Fiddle

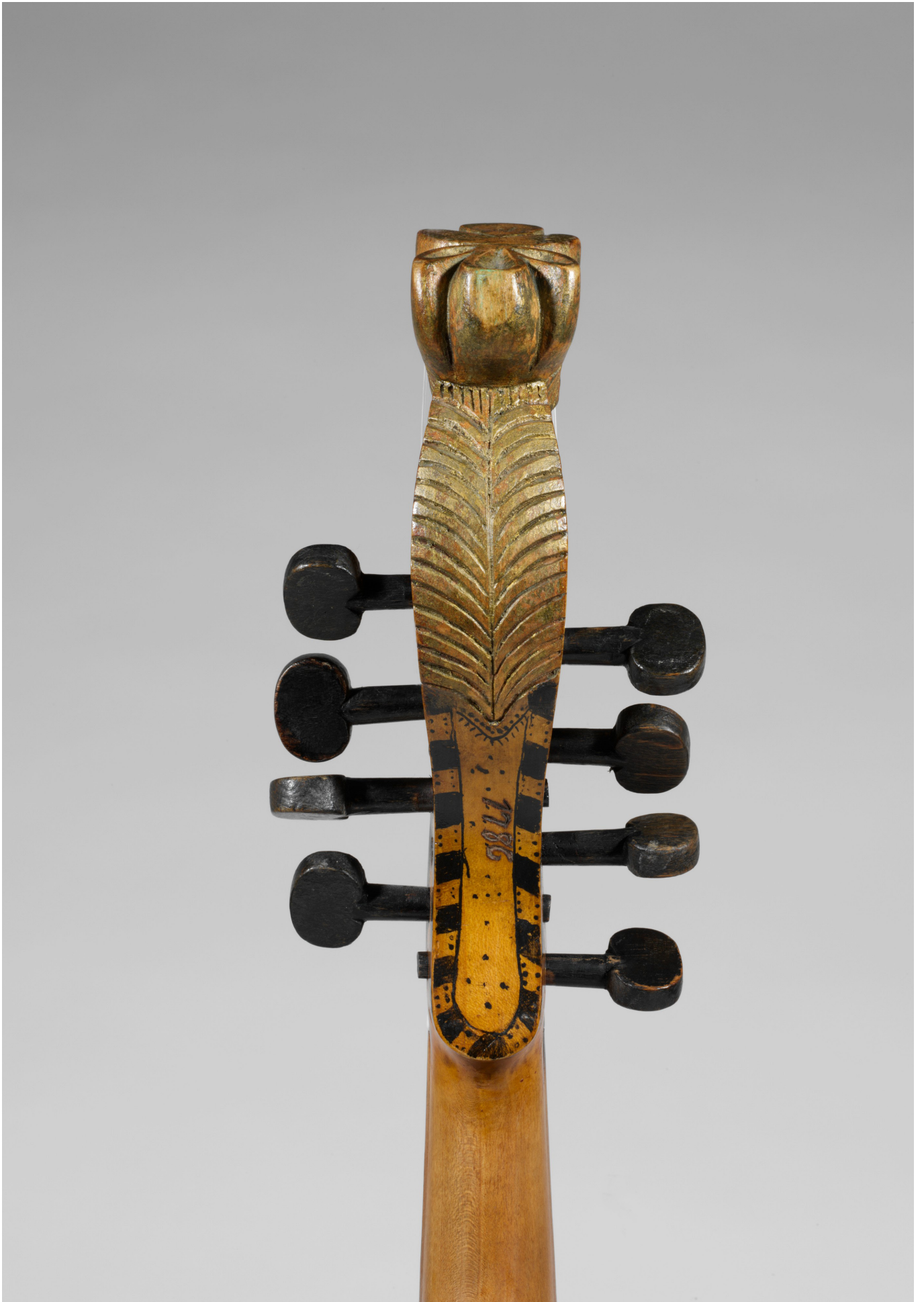




The Hardanger fiddle of western Norway has a violin form but features a fanciful scroll, a highly decorative fingerboard and tailpiece, ink designs on front and back and sympathetic strings that run through the bridge and under the fingerboard. Isak N. Botnen (1669-1759) and his son Trond Botnen made both standard violins and Hardanger fiddles.







Thomas Walker Bracket Clock

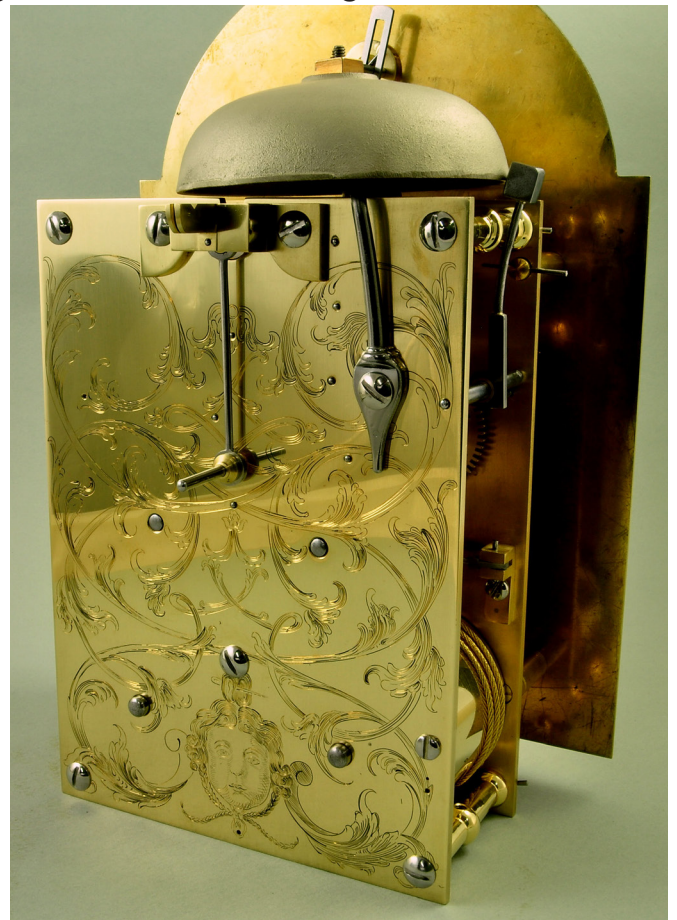


The Colonial Williamsburg Foundation.

Fredericksburg, situated on the falls of the Rap-pahannock River, had become Virginia's leading industrial centre by 1770.

The work of Thomas Walker compares favourably with other American engravers. In fact, his production of bracket clocks ranks him in the highest order of American clockmaking. That he produced the highest quality metalwork in colonial Virginia is unquestionable at present, for no other examples begin to approach the excellence of his products.

The bracket clock has a movement of good quality housed between brass face and back plates that are decorated with bold, fine engraving. The shading is cut with a three dimensional effect, which is achieved by the simulation of a light source coming from the left. This sophisticated engraving is seldom seen on American-made objects and is testimony to the high level of the engraver's artistic training.



This engraving has, in fact, raised some questions as to the origin of the Walker clocks. Did he import movements and apply his name to them, or did he order them from England with his name and city already engraved on the dial? A study of the engravings on the three clocks illustrated here results in the conclusion that they were executed by the same hand. The engraving on this bracket clock appears to be the earliest; it is composed essentially of arabesques with only two small rococo shells and C-scrolls. The movement of the tall clock in the Williamsburg section (fig. 84) appears to be the latest, with an abundance of rococo features and a floridness typical of that style. While the change in style is strong, the technique of the engraving and the small design elements show the same approach. The latest example shows some degeneration in the quality of the engraving.

The dominant feature of the bracket clock back is a classical mask having an unusual extended hair style with a large needle thrust through it. Perhaps this feature is only meant as decoration, but the possibility exists that the needle is an allusion to the textile industry since the term "walker" was synonymous with "fuller" and referred to a trade within the textile industry.

Since no other colonial period bracket clocks are known from eastern Virginia, it is impossible to determine where this case was produced. It appears to be eastern Virginia and, of necessity, is presumed to be from Fredericksburg because of Walker's signature on the movement.

The bracket on the front cover is an exquisite reproduction of the 18th century Fredericksburg, Virginia clockmaker Thomas Walker by clockmaker David Lindow of Lake Ariel, Pennsylvania.

The clock was one of the subjects presented in our 2013 Symposium: Working Wood in the 18th Century; Small Things Considered, and was the product of a great team of talented Colonial Williamsburg tradesmen.



The Colonial Williamsburg Foundation

From left to right: Bill Pavlak, journeyman cabinetmaker, planed the base and cornice molding; George Suiter, master gunsmith, engraved and blackened the Arabic and Roman numerals; Kaare Loftheim, journeyman supervisor cabinetmaker, framed up the case, doors, and cap; Lynn Zelesnikar, master hand engraver, executed the decorative detail on the clock face and back plate; and Mike Noftsgen, journeyman brass foundryman, cast and polished the brass feet.